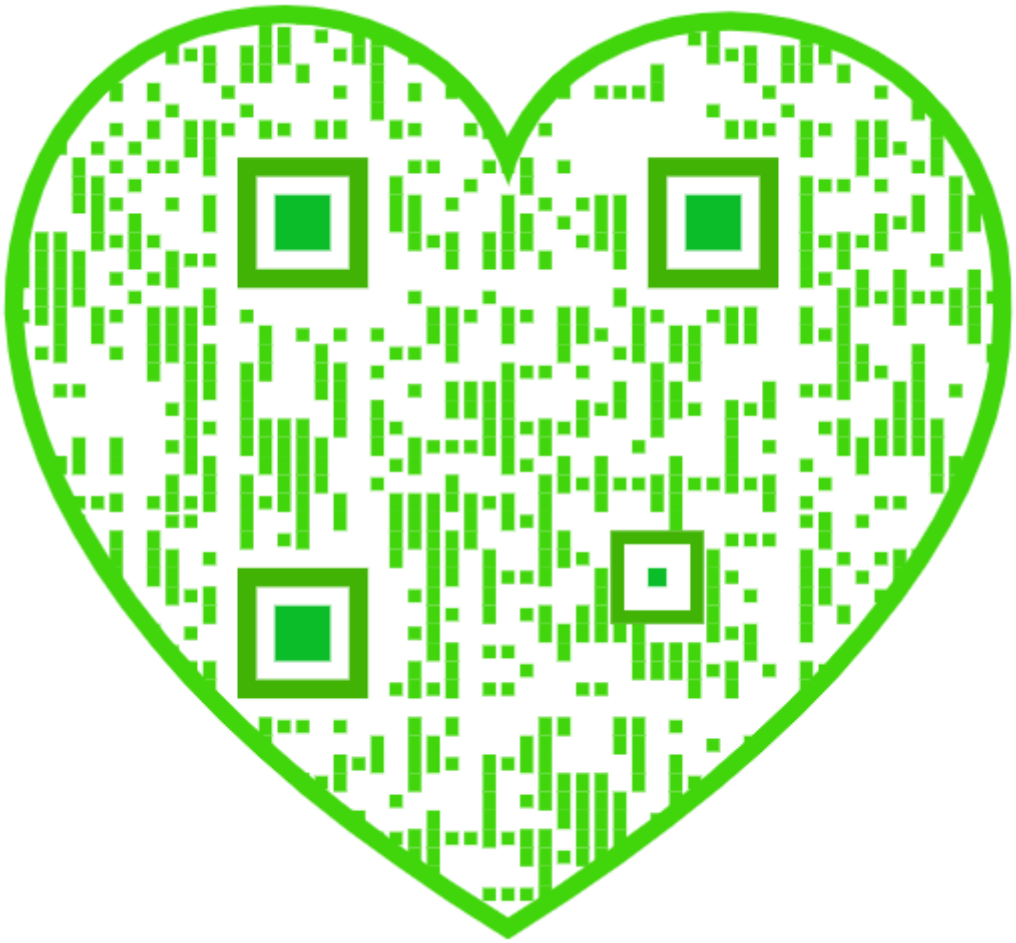

THE PACIFIC COAST ARCHITECT

A·MONTHLY·JOURNAL·FOR·THE ARCHITECTURAL · INTERESTS

SAN FRANCISCO
CALIFORNIA

VOLUME SEVEN
NUMBER ONE

MARCH, 1914

GLADDING McBEAN & COMPANY

Architectural Terra Cotta Face Brick

Fuller Varnishes

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In the August, 1913, issue of this magazine there appeared some details of Laying Tin Roofing over wood strips, which makes a pleasing appearance in the design of roof construction, the same as used on the above building.

You will also find our catalogue in "Sweet's," pages 546-549, in the 1913 Edition.

Architects and draftsmen can get, from us, on request, a useful little reminder of our "TARGET AND ARROW" Tin in the form of a six-inch celluloid edge boxwood scale.

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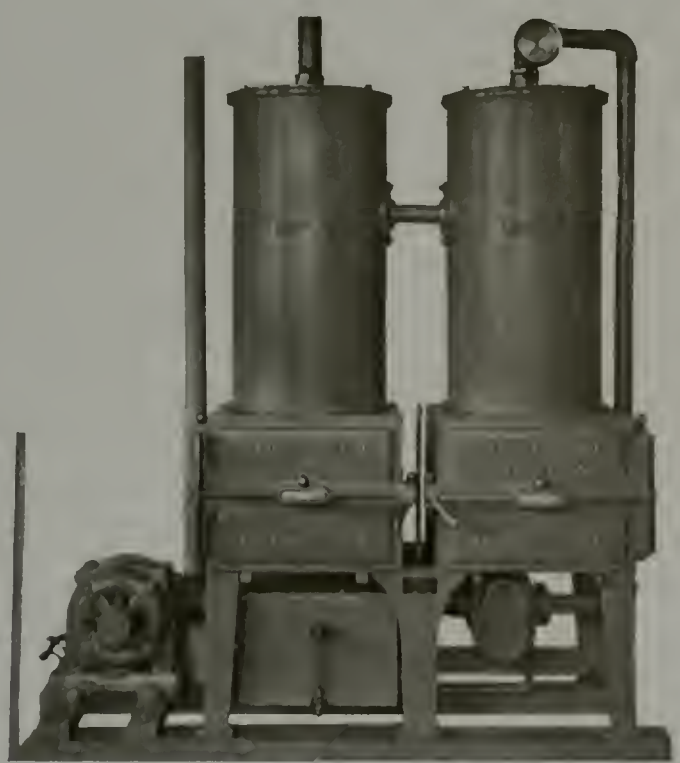

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The Pacific Coast Architect

VOLUME VII — SAN FRANCISCO, CALIFORNIA, MARCH, 1914 — NUMBER 1

THE PACIFIC COAST ARCHITECT

J. A. DRUMMOND . . . . . PUBLISHER

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The Editor will be pleased to consider contributions of interest to the readers of this publication. When payment for same is desired this fact should be stated. Self addressed envelopes must accompany all such contributions.

ADVERTISING RATES ON APPLICATION TEL. DOUGLAS 3424

EDITORIAL.

SPECIAL ANNOUNCEMENT.

Owing to the fact that THE PACIFIC COAST ARCHITECT has for some time past been the official organ of the San Francisco Chapter of the AMERICAN INSTITUTE OF ARCHITECTS, the motion was approved at their meeting February 19, 1914, "that hereafter all their members shall look to this publication only for announcements, notices, minutes of meetings, etc."

The Publisher of The Pacific Coast Architect is changing the date of issue to conform with the meetings of the Local Chapter A. I. A., which is on the third Thursday of each month ranging from the fifteenth to the twenty-first. Each number will be in the mail as soon as possible after securing the data from the meetings.

Owing to the time required by the printers, also intervening of Sunday and holidays, it is necessary to date the February number on March the first, and for that reason it will be called the March number and so on, thereafter coming out the latter part of the month previous to its date.

We heartily thank the architects, particularly those located on the Pacific Coast and in the Inter-mountain section, for their support to this magazine, especially their subscriptions which are entirely paid, and in this respect they have responded nobly.

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The Southern California Chapter of the American Institute of Architects are in the field to secure the 1915 National Convention of the A. I. A., to be held in Los Angeles and the prospect seems to be favorable. With the Expositions at San Francisco and San Diego, a large attendance is assured.

A special feature is to have a National Architectural Exhibit in San Francisco immediately after the convention in Los Angeles.

All the Western Chapters should lend their assistance to make this a successful reality.

Up-to-Date Specifications

The point continually arises about several architects using a so-called stereotyped form of specifications, and applying them to the majority of buildings, when different conditions prevail therein.

Several manufacturers and material houses who make standard goods often change their articles, or numbers and names of the same product, and also new articles come out from time to time.

We find specifications calling for articles used from five to ten years back, that are not at present manufactured. An Architect necessarily has to familiarize himself with a thousand and one items of material going into a building, in conjunction with being an Architect, also an Artist, and for this reason he should be granted consideration, as well as giving audience to a specialty man representing goods of standard manufacture and articles containing merit.

We advocate standardizing all literature to a uniformity of size convenient for filing purposes, and boiling it down to the point. We often find descriptive matter which requires considerable time to read that could be condensed from one-fifth to one-tenth of the space; in other words, be brief, time is short and valuable.

Every material man is expected to be a specialist in his own line, and if questioned will be found wanting in other branches of the building industry, although the Architect is supposed to know everything.

It is conceded that an Architect should know what he wants and so specify it and "break his pen" when he starts to write "or equal." The professional man is paid for what he knows, not what he is guessing at. While no person is perfect, let us all stand together for results. Therefore Architects and Material men should meet on a common ground and exchange points of mutual interest in view of perfection towards the proper interpretation and wording of specifications, for standard goods or staple material on the present day market found to contain proper merit.

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Recent Court Decisions

Where plaintiff engaged defendants to draw the plans for the remodeling of a building, instructing them that the work should not amount to over $7,000, and they skillfully drew plans, but informed plaintiff that they could not estimate with accuracy the cost of construction, he cannot recover damages because the cost of construction exceeded the limit, where several contractors refused to do the work for the price fixed, and the ones engaged refused to make an estimate, but did it on percentage, for the error, if any, by the contractors, was not the proximate cause of his injury, as, in view of Civ. Code, Sec. 19, he had notice of facts which would put him on inquiry before he let the contract. Benenato vs. McDougall, Supreme Court of California, 137 Pacific 8.

American Architecture Criticized

A very noted Architect, Matusnosuke Moriyama, of Japan, has recently made a trip throughout the United States for the purpose of inspecting American Architecture. We find he criticizes the buildings in this country from an Architectural standpoint, and lays stress on those in Europe as being of a higher architectural nature.

He especially calls attention to the sky-scrapers of this country and of course mentions New York, as being an accumulation of building material for commercial purposes, although he gives this country credit for being away ahead in Architectural Engineering and Scientific Heating Systems, and the quality of the building material used. This naturally speaks well for the Material Men, and from this person's view it would seem that the Material Man has something on the Architect. The conclusion to be drawn from this is that the Material Man is entitled to an audience.

We do not notice where Architect Moriyama has made any mention of Pacific Coast Architecture. This type seems to be of some prominence as a great many western Architects are called upon to furnish plans and specifications for residences and bungalows to be built throughout the east and we also notice that eastern Architectural publications make special numbers of Pacific Coast buildings, and that they are devoting considerable space to buildings erected in this section. Although one publication has moved one prominent building from San Francisco to Los Angeles, the majority of eastern publications are gathering up material in this section, both by correspondence and personal solicitation, and for that reason it must be conceded that we have something on the Pacific Coast in the way of Architecture.

While a great many architects from the larger eastern cities occasionally have charge of buildings on the Pacific Coast, it is with pleasure we can cite an instance where a well-known San Francisco architect is erecting a very prominent building in Kansas City, Mo.

We might call your attention to the April number of this magazine which will show a cluster of building perspectives of prominent buildings as erected by one architect in the rehabilitation of San Francisco since 1906.

It is also very apparent that our Pacific Coast Architects have an opportunity of showing their talent when you notice the 1910 census showing an increase of 68.5% in population over the census of 1900, for eleven states, against 15.9% in the eleven largest eastern states according to population

New Architects

The California State Board of Architecture has granted certificates for the practice of architecture to the following: W. S. Greene, 1030 Van Nuys building; Francis Barry Byrne, 805 Trust & Savings building; and Clinton Hall, 801 South Union Avenue; all of Los Angeles; R. Rayner Christien, 931 North Spurgeon Street, Birger V. Elwing, 410 West Second Street; and J. Lhool Walker, 303 East Fourth Street, all of Santa Ana, and John Cyril Bennett, 176 Terrace Drive, and Charles E. Norberg, 1211 Avoca Avenue; both of Pasadena. Also Frederick P. Dinkelberg, 1005 Chronicle building, San Francisco. Mr. Dinkelberg came from Chicago where he was for seven years chief draftsman for D. H. Burnham & Co.

Proposed Legislation for the British Registration of Architects

The Society of Architects has now prepared for presentation in the forthcoming Session of Parliament a Bill to provide for the registration of architects. It is, in general principle, similar to the Bill of 1903. It will provide that all architects in bona fide practice at the passing of the measure shall be permitted to register, and that thereafter registration shall be limited to such as have been properly educated and have proved their qualifications by proper examinations.

The object of the Bill is to enable persons requiring professional aid to distinguish qualified from unqualified architects. It is proposed to establish a Council of Architectural Education and Registration of the United Kingdom. The council is to consist of (1) persons nominated by his Majesty with the advice of his Privy Council; (2) architects chosen by the Council of the Royal Institute of British Architects, the Council of the Society of Architects, founded 1884, and the Council of the Royal Institute of Architects, Ireland; and (3) architects elected as direct representatives by registered practitioners.

Persons qualified to be registered comprise Fellows, Associates, and Licentiates of the Royal Institute of British Architects, members of the Society of Architects, founded 1884, or professional members of twenty-two specified provincial societies, as well as persons actually practising architecture in the United Kingdom, who were practising on January 1, 1914; also apprentices, assistants, or practioners in architecture of a certain standing. Other applicants for admission after January 1, 1915, must be not less than 21 years of age, and must have been educated for architecture and pass an examination authorized by the Council.

The Bill provides that after January 1, 1915, no person shall be entitled to take or use the name or title of architect unless he be registered; and any person who, not being registered takes or uses any such name, shall be liable to a fine not exceeding £20, and on repetition of the offence £50. No person shall be entitled, after January 1, 1915, to recover any charge in any Court of Law for any professional services rendered as architect unless he is registered under the Act.

The right of members of the Institution of Civil Engineers and other bodies to recover charges "for work of any kind falling within the duties of their calling" is untouched.

Tells Function of Advertising

At the final session of the annual salesmen's convention, C. L. Forgey, advertising manager of Berry Brothers, Detroit, lays out plan for salesmen.

Here are some of C. L. Forgey's timely remarks on advertising that hits the point dealing from actual experience.

"Advertising is publicity plus salesmanship.

"Every word, every booklet, every circular, every advertisement of ours, is created with the idea and purpose of making the consumer say 'Berry Brothers,' when going into a store for varnish.

"We want to lay stress on the salesman's advertising portfolio, which provides a convenient method of carrying advertising matter. No salesman can carry it all in his mind, or loose in his grip.

"Business nowadays is a battle, and sometimes it is necessary to resort to the spectacular, such as Hilton's boiling stunt and the device of the varnished wire mesh bowl.

"Berry Brothers is not going along on momentum, but because of its modern, progressive, aggressive methods.

"In all our advertising we have kept in mind the problems of the men who are actually selling the goods, the problems of those on the firing line."

Mr. J. S. Stevenson, general manager of Berry Brothers, stated before the annual convention at Detroit about their new plant in San Francisco as follows:

"Since I last had the pleasure of addressing you, besides our normal growth in a general way at our factory here, by which our capacity has been greatly increased in various ways, we have made some extensive additions to our Canadian factory at Walkerville and have acquired a new factory in San Francisco. We are not a little elated about this coast deal which only quick action on our part saved from going elsewhere and our San Francisco staff, will, we are sure, appreciate and take the fullest advantage of the increased facilities offered."

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Arizona Architectural Competition

Architect Myron Hunt, advisor to the regents of the University in the proposed architectural competition for a new university building to cost $150,000, announces that the competition will be an open one under the rules of the American Institute of Architects. No geographical lines will be drawn upon those eligible to compete. The program for the competition has been drawn, but the regents of the University are waiting to have some points regarding the Arizona law requiring competitions on public buildings cleared up before announcement is made. Arizona has a law identical with the law passed by the California legislature in 1872 which the courts of this state have recently held to be inoperative. The Arizona law has been observed in a desultory fashion and conflicting opinions have been rendered by county attorneys regarding its status. As a matter of fact the Arizona law is as much of a dead letter as the California law and it is believed the same grounds exist for declaring the Arizona law inoperative as were found in California. The matter is now receiving the attention of Arizona legal authorities.

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Architecture and Architectural Engineering at the Panama-Pacific International Exposition

Of all classes of craftsmen who will visit the Panama-Pacific International Exposition in 1915 there will be none whose delight will be keener or whose interest more general than the architect and the architectural engineer.

The exposition itself will be a huge and superb exhibit of the genius of architects. From the Palace of Machinery, which is the largest wooden structure in the world, to the Palace of Fine Arts, which will be constructed to conform with every modern demand for "class A" fireproof structures, the grounds will be a constant challenge to the attention and interest of the architect. The reclamation of the exposition site will be likely to engross the attention of the architectural engineer who is acquainted even superficially with the problems of pre-exposition preparation when much of the 635 acres of exposition domain was marsh or tide land, submerged in the waters of San Francisco bay, or the abode of the long legged water bird and the clam.

But supplementing the architectural display represented by the exposition itself, there will be found in the Palace of Liberal Arts a splendidly comprehensive exhibit of data, drawings, models and photographs related to architecture; there will also be an equally comprehensive display in the exhibit of architectural engineering. Here will be shown the models and working plans of public and commercial buildings, large and small dwelling houses, flats, apartment houses, models, detail drawings and specifications for foundation walls, partitions, floors, roofs, stairways and wood and metal framing, while there will be great general interest in the safety contrivances provided against the terrors of panic and danger by fire, as well as in novel means of convenience provided by such media as moving stairways, elevators, etc.

The displays of drawings and models of public buildings will be particularly effective and comprehensive, showing to what extent the various needs of complicated metropolitan life have been cared for by the designer of modern structures, hospital buildings, court houses, hotels, bank buildings, libraries, boat houses, tennis courts, gymnasiums, riding academies, stables, stations, lodge buildings, churches and finally, and most important perhaps of all, homes.

These models and designs of ideal homes will range through all degrees of elegance, and will not only include dwellings in their entirety, but special designs of particular rooms such as dining and bed rooms, library and drawing rooms, model kitchens and even model pantries, so that the visitor who contemplates building a home of his own will here find a thousand hints to be utilized to his lasting advantage.

Architects who have specialized in various lines of their splendid profession will here provide the world with a view of the latest developments of their art and there will not be a problem which the builder encounters, but what will be covered by the displays which the greatest architects of the world will disclose in the palace of liberal arts. The assurance of the complete character of the exhibit is direct from the host of proposed participants themselves and from those whose earnest inquiries indicate their intended participation.

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Buying Standard Goods

An advertisement in a current periodical is written by a purchasing agent. It tells how, in his younger days, this agent thought that "Price" was King, and that to cut a half-cent from standard prices was his idea of earning his small salary.

Later he learned that the goods thus bought invariably were a half-cent shy on quality—or worse. He was not praised by the boss. He was "condemned by the whole works." Now he buys only standard goods. Quality is King, and price but a humble subject.

By "standard" he does not mean necessarily the highest priced stuff, but goods that are the best adapted to the purpose for which they are made and that are so uniform in quality that the manufacturer dares to identify them with his trade-mark.

The purchasing agent who studies, first, what are standard goods in his particular line and then confines himself wherever possible to the buying of such goods, builds for himself as pleasant a berth as the field of business can supply, and is a daily growing comfort to those who have to use what he buys and pay the bills he incurs.

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The joint annual meeting of the California State Board of Architecture is to be held in Los Angeles, April 9th, 1914.

The Man Who Doesn't Advertise

The business man who does not advertise, simply because his grandfather did not, should wear knee breeches and a queue. The business man who does not advertise because it costs money should quit paying salaries for the same reason.

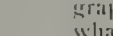
The business man who does not advertise because he tried it once, and failed, should throw away his cigar because the light went out.

The business man who does not advertise because he doesn't know how himself, should stop eating because he can't cook.

The man who does not advertise because somebody said it did not pay, should not believe the world is round, because the ancients said it was flat.

The man who does not advertise because he cannot know absolutely that it is going to pay, should commit suicide to avoid being killed by an accident.

The man who does advertise, but who insists on his business literature in inferior covers, simply because they cost less than the "Uncommon" kind, should wear blue jeans overalls, because they are cheaper than tailor-made clothing.—Franklin Messenger.



Culbertson Residence, Pasadena, Cal.

The problem to be solved in designing this dwelling place was different from the average. The owners, three maiden ladies, chose the plot of ground themselves. It was their wish to have all rooms on one floor level, but they objected to bedrooms on the ground floor. By placing the north wing of the building beyond the edge of the steep slope, the bedrooms are about 16 to 20 feet above the ground.

The south wing from the front of the building contains the living room, entrance hall, dining room and kitchen. The western portion connecting these two wings contains servants' rooms, guest rooms, etc. The enclosed court, protected on the east by the pergola, is thus given the necessary privacy, no matter what may be built upon the adjacent property.

The south wing and western portion are raised above the north wing in order that the mountain view from the gallery, garden room and living room may not be intercepted. The court level at the south side is also higher than the north side. The canon to the north, with its roadway at the foot of the garden, prevents the adjacent property from encroaching on the privacy from that quarter.

The driveway enters at the southeast corner of the property and extends northward at an incline that brings it down to the wall of the garage, the roof of which is but two steps above the terrace level of the court. Thus the roof of the garage forms part of the terrace on the north side of the court. A retaining wall connects the garage and the north wing of the house. Steps to the terrace below begin at the corner of the garage, and land near the head of the garden flight, which is marked by two posts supporting a lantern. The overflow from the fountain in the court follows the channels inlaid with tile at the outer edges of each step till it reaches the pool below. The garden steps are protected with iron railings.

The entrance hall has a high vaulted ceiling, with a single alabaster lamp suspended from the center by a silver chain of antique pattern. The mountings are of the same material.

As one faces a wide window on the north, a glimpse of the tiled fountain in the court may be had.

The furniture of the hall consists of two tall backed chairs of very dark crotch mahogany, inlaid with Koa, lilac roots and Vermillion. The design is a delicate band with twining wild roses. There is a large case or wardrobe of the corresponding design and material. Also two smaller tables at each side of the opening to the living room. The floor covering is Bohemian hand tufted rugs in shades of blue, with a touch of soft dull gold after a Chinese pattern. The same is in the living room.

The living room furniture is of the same material, but slightly different design from the hall. The chairs and two couches are covered with silk brocade, black and gold, after an old Queen Anne pattern, in imitation of the Chinese. The walls of both rooms are covered with linen velour specially designed for hangings. The color of this and the woodwork is something near cafe au lait, but being changeable, it harmonizes well with the rugs and tones with the dull gold. There is a large desk table with a dull black marble top, delicately golden veined. There is a bookcase and a secretary, both with glass doors. A cut design of roses suggests the inlaid design of the hall pieces. There is a very delicate inlay of lines and conventional flowers in all of these pieces. It is golden in color. In the photographic reproductions the color scale has been somewhat disarranged. Some harsh lines and contrasts that are not to be seen in the original, show disagreeably.

The lighting fixtures are of glass, cut in simple hexagonal stems without elaboration of any kind. The metals are enameled in shades like the walls, but stronger, with touches of very soft Pompeiian red and dull green in leaf design. There are silk shades covering candles.

The fireplace is of Tavernelle marble. The andirons and fire screen are of dull polished steel, with the design chiseled. The curtains and bandeaux are of the same brocade as the covering of the furniture. There are also scrim curtains at the windows.

The dining room walls are of velour, rather more silvery in tone. The rug is of the same make and similar design to hall and living room. The color is of soft coral ground with medallions of warm gray, straw, etc. The mantel is of Benoa Janne marble, selected for predominating grays, which are warm enough to set off without too much contrast a center panel of coral colored Numidian marble. The furniture is of mahogany, but lighter and warmer than that of the hall and living room. The center table is round and has simple ribbon inlay in the top, which is meant to hold a small center piece and vase of flowers when not in use. The serving table and sideboard have tops of Numidian marble, to match the panel in the mantel. The carved inlay is of oak knots, representing reeds and lotus flowers.

The garden room, next to the dining room and in the angle of the west portion and south wing, is glazed on one side. It overlooks the court and has a fine view of the mountains that rise above the dark oaks just below the terrace wall. The sash all slide up out of sight and wire screens may be pulled down in summer when the house fly becomes troublesome. It is furnished in harmony with the gallery. The floors are covered with Oriental rugs, mostly of Saraband pattern. The walls are hung with the same material as the dining room. There are Queen Anne carved walnut chairs and a settee. Also Queen Anne lacquered chairs and settee, a secretary and other pieces of the same period. The electric fixtures are antique silver lanterns hung from the ceiling. In the north wing the gallery is furnished with mahogany. Three part book case and desk. The chairs are of reed, with velveteen cushions.

all finished in colors similar or in harmony with wall covering.

One bedroom is furnished in old mahogany, with brocade hangings for bed and windows. A cabriole chair is covered with the same. Two other bedrooms have enameled pieces. One is decorated with painted roses.

The guest room has a lacquered set. The stairs at the north end of the gallery lead down to a large room, either a library or billiard room or entertainment room. Across the hall from this, one may enter the loggia through an Italian doorway of carved Istrian stone. Descending a short flight of steps, we reach the level of the second terrace.

At the east end of the loggia there is set in the wall a very good reproduction in marble of Michael Angelo's Madonna, now at Florence, Italy. The loggia is lighted by Italian gilt lanterns, reproductions of the antique. The floor is terrazzo, with simple border.

From the loggia we pass along the terrace to the east and descend by the garden steps to the pool below. The steep slope is protected by a dry wall of natural moss covered boulder. Ferns and creeping plants will cover these walls in a short time. There are winding paths and stone seats under the spreading live oaks. It is so arranged that it may be used in both summer and winter.

The pool is to be planted with lilies. The garden is not yet completed.

The furniture and fittings were either selected or designed and carried out by the architects.

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The Tramway Building, Denver, Colo.

By Roger W. Toll, Chief Engineer, the Denver City Tramway Co.

The growth of The Denver City Tramway Company has been along radiating lines and a majority of the car lines of the system have their terminus at the "Central Loop" on Fifteenth street, between Arapahoe street and Lawrence street. The car lines that do not terminate at the loop, pass within a block or two of it, so that the Central Loop is the heart of the system. The Interurban Loop, which is used by Denver's suburban cars, is located on Arapahoe street between Fourteenth and Fifteenth streets, so that the street railway center of Denver is at Fifteenth and Arapahoe streets.

The Tramway Company has never lagged behind the growth of Denver, but has been a potent factor in the building of an extensive city. With the increased growth of the city and the street railway system, the Tramway Company felt the advisability of collecting as far as possible under one roof, the various departments of the organization. The economy to be effected by the construction of a car barn in the heart of the city was also apparent, and the company decided upon the erection of a two story car barn and an eight story office building. An ideal site for the purpose was secured on Arapahoe street between Thirteenth and Fourteenth streets, one block distant from the interurban and city loops.

The architects for the building are Messrs. W. E. and A. A. Fisher; the consulting engineers are Messrs. Crocker and Ketchum; the general contractors are Whitney-Steen Company; the building was planned and erected under the supervision of the engineering department of the Tramway Company.

Construction was begun in March, 1910, and the building was occupied in May, 1911.

Fireproof construction has been used and every safeguard against fire has been installed, so that a low insurance rate will be obtained.

Considerable attention has been given to a club room for trainmen. This is conveniently located in the car barn and is equipped with the most desirable features.

Office Building

This office building will allow the Tramway Company to concentrate in a central administration building its somewhat scattered departments, bringing them much nearer the center of the system.

This building is 60 feet by 125 feet and consists of a basement and eight floors. The Tramway Company will at present occupy five floors, and the remaining three floors are rented until such time as the increased growth of the organization requires their use by the company.

The building is of re-enforced concrete framework. Square steel rods were used as re-enforcing. Gravel was used for the concrete. The exterior is finished with "Blackstone" brick of a rich red color, laid with wide joints of black mortar; and ornamental white terra cotta. The floors are of structural terra cotta and re-enforced concrete combined. The interior partitions are of hollow tile. The public halls will be furnished with Tennessee marble flooring of a light pink shade, and a veined white Arizona marble wainscot to a height of four feet, with a base of green Vermont marble.

The office room is floored with wood.

Wherever there is a fire risk, metal window frames are used with wire glass panes.

On the lower floor are the offices of the superintendent of transportation and the treasurer. Also a room for distributing lost articles turned in by trainmen; also a large bulletin room used by the trainmen and containing lockers for their use. The second floor is occupied by the physicians, the Tramway Mutual Aid Society and the legal and claim departments. The third, fourth and fifth floors are rented as stated above. The auditing department will occupy the sixth floor, and the engineering department the seventh floor. The eighth floor is occupied by the president, directors, vice-president and general manager and purchasing department.

There are two public elevators, each 5 by 8 feet, and one private elevator.

Each floor has two vaults for documents and records. There is an additional vault in the bulletin room on the first floor, to be used for receiving the daily receipts of conductors. The conductors will deposit their receipts in this vault by means of a burglar proof chute, leading to a truck in the vault. This truck will be taken daily to the treasurer's office on the same floor, where it is emptied and replaced in the vault.

A large number of the offices are provided with wall safes.

The offices of the treasurer, general manager and auditor are connected by a pneumatic tube system to expedite the delivery of vouchers and other papers.

There is a public mail chute in the hall on each floor, and a private mail chute connecting some of the departments.

The floors occupied by the auditing department and the engineering department each have a private telephone system for communication between the offices on the same floor.

The elevator machinery is located in a pent house on the roof.

The roof is made waterproof by laying a composition roofing on a concrete slab.

Heating

A vacuum direct steam heating system is used throughout the office building. Three 150 H. P. boilers are installed in the basement. This plant also heats the car barn and other buildings of the company at the Central Loop. The boilers are equipped with chain grates, coal hoppers and ash conveyors.

Lighting and Power

The office building, car barn and Central Loop buildings will receive light and power from the plant in the basement of the office building. This consists of two motor-generator sets, one of 40 K. V. A. and the other of 75 K. V. A. The motors are driven by 600 volt D. C. supplied by the company's main power plant. This feed connection is in duplicate to insure continuous operation. The generators will supply a three wire 110-220 volt, A. C., 60 cycle distributing system for lighting, and for power to run a ventilating fan for the car barn, and power for the pneumatic tube system. The elevators, house pumps, sump pumps and roller doors are operated by 600 volt D. C., which is the Tramway Company's trolley voltage.

Car Barn

The car barn is 125 feet by 320 feet. The street surface of Thirteenth is fourteen feet lower than Fourteenth street. This difference in elevation is utilized by making a two story car barn and still avoiding the necessity of a car elevator. The tracks enter the lower floor from Thirteenth street and run down a .75 per cent grade, while the tracks enter the upper floor from Arapahoe street near the office building and run up a .75 per cent grade, toward Thirteenth street. This arrangement permits a height of 15 feet 6 inches from top of rail to trolley for the lower floor. The trolley height is 16 feet 6 inches on the upper floor. This trolley height is sufficient, although the height on street work is 18 feet.

The gauge of the Tramway tracks is 3 feet 6 inches, but some of Denver's interurban lines are standard, 4 feet 8½ inches, gauge. One-third of the tracks in the barn are built with three rails, and the tracks are so located that they can all be third railed, should this prove advisable.

There are nine tracks on each floor. Those on the lower floor enter the building from the end and run straight for the length of the barn. The full length of each track, about 320 feet, is available for car storage.

The standard Tramway motor car is 43 feet 6 inches long. The car barn will accommodate 63 cars of this type on the lower floor, and 48 cars on the upper floor, making a total capacity of 111 cars. In order to provide for a possible increase in the size of future equipment, the tracks have been so located as to accommodate cars 51 feet long and 9 feet 1 inch wide. The upper floor is designed for cars weighing 27½ tons, and the lower floor is designed for cars weighing 50 tons. The upper floor is for car storage only, but each track on the lower floor is provided with a pit 291 feet long, so that the cars may be easily inspected. It is not, however, intended to use this barn as a general repair shop, but only for inspection and emergency repair work.

There is a partial third floor above the two car barn floors. This floor contains an auditorium, gymnasium, shower baths, lockers, reading room, barber shop and bowling alleys. The auditorium is 58 by 70 feet and has a seating capacity of five hundred. This auditorium is used for trainmen instruction classes, meetings and entertainments. The gymnasium is 27 by 47 feet. The bowling alley contains four standard alleys and is well equipped. The gymnasium, shower baths, reading room, lockers and bowling alleys are for the use of the trainmen. These rooms being on the upper floor, have ample light and air.

The car barn is of re-enforced concrete and steel construction. Re-enforced concrete is used wherever practical, but in locations where long spans are desired, steel girders have been used. The largest girders are over the Thirteenth street entrance of the car barn. The outside finish of the car barn is of the same materials as the office building, so that the appearance of the two buildings is harmonious. Their combined length is 386 feet.

Each floor of the car barn is separated into two bays by a brick fire wall. This was done in order to improve insurance rates.

On the lower floor there is a line of columns between each two tracks. In order to keep a maximum clearance, these columns were limited to a width of 12 inches; the largest column is 12 by 40 inches in section.

The pits on the lower car floor are 4 feet 9 inches deep below the top of the rail, and 2 feet 9 inches wide at the narrowest point. Two of the nine pit tracks are three railed, the others are for the 3 foot 6 inch gauge only, but can be three railed later if necessary. The pit runways are entirely clear and free from cross braces and other obstructions. The rails are supported by re-enforced concrete bents, spaced about six feet apart. The pits are open at the sides between bents and the rails are unsupported except at the bents. This arrangement allows access from one pit to another by passing under the rails; the clear span of the rails is of great convenience in repair work.

The car barn is completely equipped with automatic sprinklers on both track floors and on the third floor. On the car floors, both overhead and aisle sprinklers are provided. These sprinklers are supplied by a 35,000 gallon tank, located on the roof.

The car barn entrances are provided with steel roller doors. These doors vary in width from 11 feet 4 inches to 20 feet. There are ten of these doors, including one in the fire wall on the upper floor. This fire wall door is provided with a fusible link and arranged to close automatically in case of fire. The two largest doors are motor operated, with automatic cut out. The smaller doors are hand operated.

The doors in the fire wall, and between the car barn and the office building, are provided with sliding steel doors, held open by fusible links.

Tanks for motor and journal oil are provided. These are connected with self measuring pumps, located at convenient points on both floors.

An indirect high pressure steam heating system is used in the car barn. Air is heated by passing over steam coils and then forced by a centrifugal blower, 13 feet in diameter, into the ducts which lead to outlets located in the pits and at the floor level of both floors, and also to outlets on the third floor.

The lowest floor level of the office building and car barn is below the city's sewer level, so that all seepage and wash water will be collected in a sump in the car barn and pumped to the sewer level.

The car floors are lighted by clusters of metal filament lamps, designed to give an intensity of one candle foot at the floor level. Sockets are located in the pits so that portable lights may be connected. Current is supplied by the motor generator set in the office building.

Power for roller doors, ventilating fan and pumps is obtained either from the motor generator set at 220 volts A. C. or from the power house at 600 volts D. C.

General View, Tramway Building.
Denver, Colorado.
William E. Fisher and Arthur A. Fisher, Architects, Denver, Colorado.

Detail, Main Entrance Tramway Building,
Denver, Colorado.
William E. Fisher and Arthur A. Fisher, Architects, Denver, Colorado.

Rear View Tramway Building,
Denver, Colorado.

Directors' Room, Tramway Building,
Denver, Colorado.
William E. Fisher and Arthur A. Fisher, Architects, Denver, Colorado.

General View of House and Lower Garden.
Miss Cordelia A. Culbertson Residence, Pasadena, California.
Greene & Greene, Architects, Pasadena, California.

View from North Wing, Looking East.

Pool from Lower Garden.
Miss Cordelia A. Culbertson Residence, Pasadena, California.
Greene & Greene, Architects, Pasadena, California.

Front View.

Detail of Front Door,
Miss Cordelia A. Culbertson Residence, Pasadena, California.
Greene & Greene, Architects, Pasadena, California.

Corner of Court in Upper Garden.

General View of Loggia,
Miss Cordelia A. Culbertson Residence, Pasadena, California.
Greene & Greene, Architects, Pasadena, California.

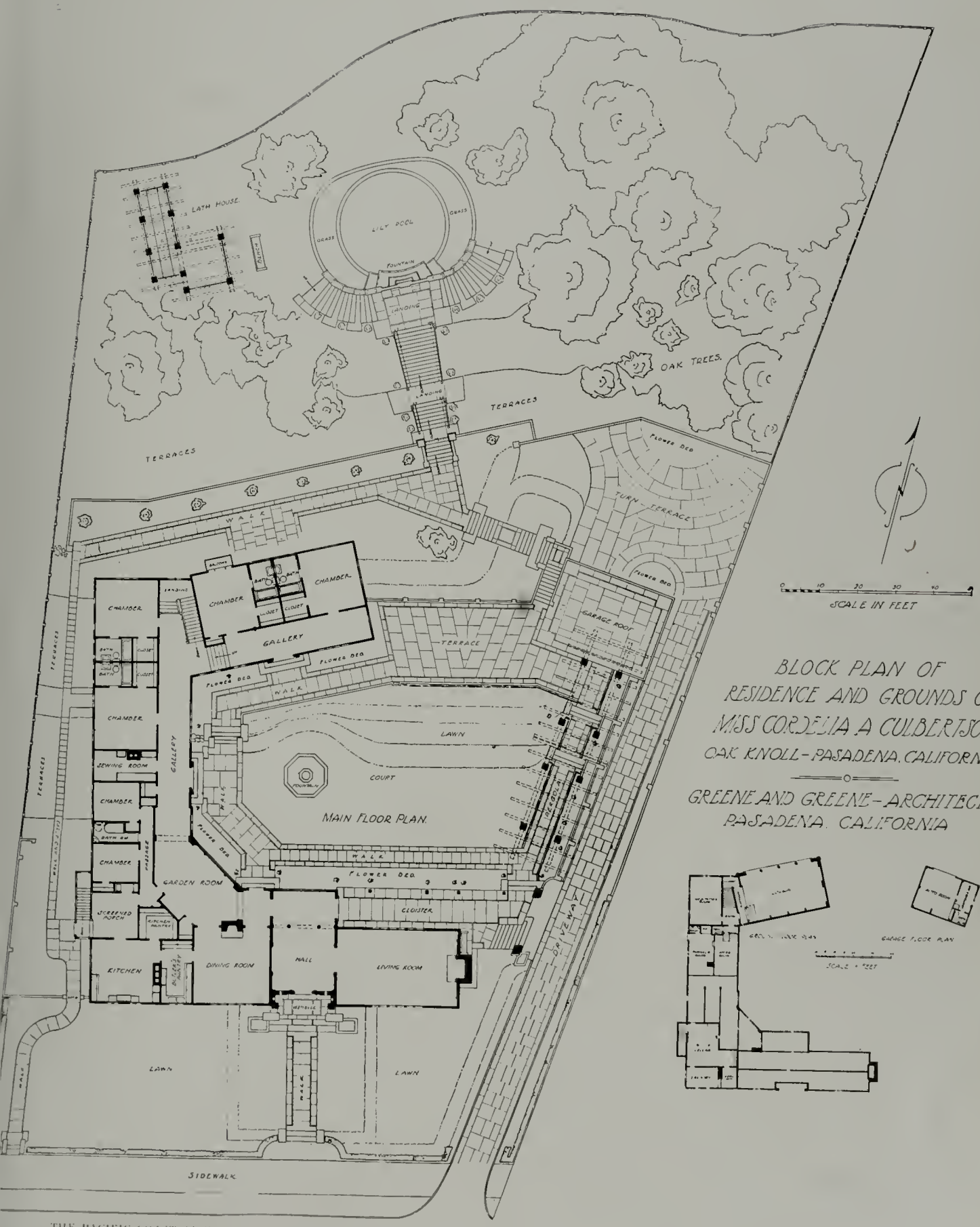
Detail of Doorway in Loggia.

Steps Leading to Lower Garden.

Miss Cordelia A. Culbertson Residence, Pasadena, California.
Greene & Greene, Architects, Pasadena, California.

Corner of Dining Room.

View of Gallery from Garden Room,
Miss Cordelia A. Culbertson Residence, Pasadena, California.
Greene & Greene, Architects, Pasadena, California.



BLOCK PLAN OF RESIDENCE AND GROUNDS OF MISS CORDELIA A CULBERTSON

OAK KNOLL - PASADENA, CALIFORNIA

GREENE AND GREENE - ARCHITECTS
PASADENA, CALIFORNIA

THE AMERICAN INSTITUTE OF ARCHITECTS.

The Octagon, Washington, D. C.

OFFICERS FOR 1914.

President ..... R. Clipston Sturgis, Boston, Mass.
First Vice-President ..... Thomas R. Kimbal, Omaha, Neb.
Second Vice-President ..... Frank C. Baldwin, Washington, D. C.
Secretary ..... D. Knickerbacker Boyd, Philadelphia, Pa.
Treasurer ..... John L. Mauran, St. Louis, Mo.

BOARD OF DIRECTORS

For One Year

Irving K. Pond, Steinway Hall, Chicago, Ill.
John M. Donaldson, Penobscot Building, Detroit, Mich.
Edward A. Crane, 1012 Walnut St., Philadelphia, Pa.

For Two Years

Burt L. Fenner, 160 Fifth Ave., New York, N. Y.
C. Grant LaFarge, 25 Madison Sq., N., New York, N. Y.
H. Van Buren Magonigle, 7 West 38th St., New York, N. Y.

For Three Years

Octavius Morgan, 1126 Van Nuys Bldg., Los Angeles, Cal.
W. R. B. Willcox, Central Bldg., Seattle, Wash.
Walter Cook, New York, N. Y.

Auditors

Thomas J. D. Fuller, 806 Seventeenth St., Washington, D. C.
Robert Stead, 906 F Street, Washington, D. C.

PACIFIC COAST CHAPTERS OF THE AMERICAN INSTITUTE OF ARCHITECTS.

San Francisco Chapter, 1881—President, G. B. McDougall, Russ Building, San Francisco, Cal. Secretary, Sylvain Schnaittacher, First National Bank Building, San Francisco, Cal.
Chairman of Committee on Public Information, William Mooser, Nevada Bank Building.
Chairman of Committee on Competition, Geo. B. McDougall, 235 Montgomery St.
Date of Meetings, third Thursday of every month; annual, October.

Southern California Chapter, 1894—Vice-President, A. C. Martin, 430 Higgins Bldg., Los Angeles, Cal. Secretary, Fernand Parmentier, Byrne Building, Los Angeles, Cal.
Chairman of Committee on Information, W. C. Pennell, Wright & Callender Bldg., Los Angeles.
Date of Meetings, second Tuesday (except July and August), (Los Angeles).

Oregon Chapter, 1911—President, Morris H. Whitehouse, Wilcox Building, Portland, Ore.
Secretary, Ellis F. Lawrence, Chamber of Commerce Building, Portland, Ore.
Chairman of Committee on Public Information (not known).
Date of Meetings, third Thursday of every month, (Portland); annual, October.

Washington State Chapter, 1894—President, Charles H. Alden, 513 Colman Bldg., Seattle, Wash. Secretary, Arthur L. Loveless, 513 Colman Building, Seattle.
Chairman of Committee on Public Information, Chas. H. Alden, 513 Colman Bldg., Seattle (till further notice send all communications to Arthur L. Loveless, 513 Colman Building, Seattle.)
Date of Meetings, first Wednesday (except July, August and September), (at Seattle except one in spring at Tacoma); annual, November.

Colorado Chapter, 1892—President, George H. Williamson, 528 Majestic Bldg., Denver, Colo. Secretary, Arthur A. Fisher, 459 Railway Exchange Building, Denver, Colo.
Chairman of Committee on Public Information, Arthur A. Fisher, 459 Railway Exchange Bldg., Denver, Colo.
Date of Meetings, first Monday of every month (Denver, Colo.); annual, September.

The Pacific Coast Architect is the official organ of the San Francisco Chapter American Institute of Architects.

San Francisco Chapter, A. I. A.

The regular monthly meeting of the San Francisco Chapter of the American Institute of Architects was held at the Tait Zinkand Cafe, on Thursday evening, February 19th, 1914. The meeting was called to order at eight o'clock by Mr. Geo. B. McDougall.

There were fifteen members present, and Mr. Lewis G. Maurer and Mr. T. B. Bearwald were present as guests of the Chapter.

MINUTES.

The minutes of the regular meeting of January 15th, 1914, were read and approved.

STANDING COMMITTEES.

Board of Directors:

Mr. McDougall, for this Committee, had nothing to report.

Sub-Committee on Competitions, A. I. A.:

Mr. Mooser reporting for this Committee, referred to the San Francisco Public Library Competition (limited), stating that the program had been referred to the San Francisco Sub-Committee, and had been approved. Also that the competition for the High School at Chico had been brought to the attention of the Committee. He stated that there were many competition programs similar to the Chico program, being published, which show every evidence of having been prepared with the assistance of architects, and which are cleverly drawn as a bait to the profession. It was to be regretted that members of the profession lent themselves to the preparation of these programs, and further that so many participated in these competitions.

Mr. McDougall took occasion to say that he had received a letter from the President of the Institute, which was substantially in accordance with the views of the San Francisco Sub-Committee on Competitions regarding some of the essential provisions of the program for the new Library Competition. In the same communication President Sturgis referred to the loyalty of the Chapter, and expressed a wish that the Chapter might increase its Institute membership. To this end Mr. McDougall stated that he had in contemplation a method which he would announce in the very near future.

Sub-Committee on Public Information:

Mr. Mooser, for this Committee, reported that one of the editors of the San Francisco Chronicle had called him up to express his appreciation for the Institute Journal, and also to advise him that it was the intention to publish shortly some interesting matter concerning the Institute. This indicated quite a change of attitude of the newspapers, and was in line with the work suggested by Mr. D. Knickerbacker Boyd.

Legislation Committee:

Mr. Mathews, for this Committee, had nothing to report, except to say that the State of Indiana had recently adopted an architectural registration law which eliminated the yearly license fee.

Building Laws Committee:

Mr. Wm. A. Newman had nothing to report for this Committee.

Educational Committee on Practice:

Previous to the opening of the business meeting, Mr. Lewis G. Maurer, under the auspices of this Committee, read a paper on Water-Proofing, which was of great interest to the members present; at the close Mr. Maurer received the thanks of the Chapter. The Committee had nothing to report.

Architectural League and Education:

Mr. Headman, for this Committee, reported progress.

Sacramento Committee on Chapter Affairs:

There was nothing to report for this Committee.

Oakland Committee on Chapter Affairs:

There was nothing to report for this Committee.

San Jose Committee on Chapter Affairs:

Mr. Binder, for this Committee, very cordially invited the Chapter to hold one of its meetings in San Jose.

Chamber of Commerce Committee:

Mr. Sylvain Schnaittacher, for this Committee, had nothing to report.

Civic League Committee:

Mr. Sylvain Schnaittacher, for this Committee, reported that he had attended a meeting of the Civic League, at which it was proposed, in conjunction with other organizations, to obtain for San Francisco the exhibition of the town planning exhibit assembled by the Height of Building Commission of New York City. This exhibit is to be shown in Oakland, and great efforts were being made by the organizations interested to obtain the same for exhibition here, although an appropriation for the purpose had been denied by the San Francisco Board of Supervisors. He also stated in this connection, that the Commonwealth Club had organized a section on City Planning, in which at the present time, five members of the Chapter were active. He urged that the Chapter members, having a membership in the Commonwealth Club, should take part and an interest in this work, as it was one which very vitally affected the whole profession.

Housing Association Committee.
There was nothing to report for this Committee

Quantity Surveying Committee:
Mr Wright, for this Committee, had nothing to report.

Committee on 1915 Convention:
There was nothing to report for this Committee

Committee on Relations with State Board of Architecture:
There was no report to make for this Committee.

SPECIAL COMMITTEES.

Committee on the Revision of the Constitution and By-Laws:
Mr. William Mooser reported progress for this Committee.

COMMUNICATIONS.

The following communications were received and ordered placed on file:

Letter from R Clipton Sturgis, President A I A., in regard to appreciation of services rendered the Institute by ex-Secretary Glenn Brown; from C. H. Whitaker, letter in regard to the changing of the name of the Chapter, and one stating resolution lately adopted by the Board of Directors of the A. I. A. Letter from the Secretary of the New York Chapter in re "Junior Membership"; from the Philadelphia Chapter A. I. A., letter regarding the above mentioned subject, together with a copy of the By-Laws of their Chapter; and copy of the "Quantity Surveyor." Letters and circulars from Geo. H. Duffield, Secretary of the National Electrical Contractors' Association of the United States, in regard to their Conduit Wire Charts; circular of competition under the direction of Chas G. Blake & Company of Chicago, for a monument for a family plot; from the National Tube Company in re the illustration of the manufacture of "National" pipe from "Ore to Finished Product" by moving pictures. Letter from Local Union No. 509, Steamfitters, asking that a committee be appointed from the Chapter, to co-operate with the Union; telegram from D Knickerbacker Boyd, giving views of the Institute in re "architectural exhibits"; pamphlet from the San Francisco Association of Members of the American Society of Civil Engineers; and letter from the Secretary of the Masons' and Builders' Association of San Francisco, in re the segregating of brickwork.

UNFINISHED BUSINESS.

There was no unfinished business.

NEW BUSINESS.

In the matter of the communication from Mr R Clipton Sturgis, President of the Institute, relating to appreciation of services rendered the Institute by Mr Glenn Brown, it was duly moved, seconded and carried that the Chapter indorse the movement outlined in the communication.

In the matter of the communication from the Institute regarding the change of name of the Chapter, the Secretary was directed to advise the Institute that no legal steps had been taken to make the change, and that nothing would be done until fully advised by the Institute

The communications from the New York and Philadelphia Chapters regarding Junior Membership were referred to the Committee on the Revision of the Constitution and By Laws

The Secretary was directed to subscribe, in the name of the Chapter, to the Quantity Surveyor The Secretary was also directed to make suitable reply to the communication from the National Tube Company.

In the matter of the communication from Local Union No 509, Steamfitters, and also the Masons' and Builders' Association of San Francisco, it was duly moved, seconded and carried that the Chair appoint a Standing Committee to be known as the Committee on Relations with Building Trades The following members were thereupon appointed:

Messrs Henry A. Schulze, Chairman, Matthew O'Brian, William Mooser, G V Wright, Albert Schroepfer, Sylvan Schnaittacher

The communications above mentioned were then referred to this Committee for consideration

In the matter of the architectural exhibit for 1915, the communications and correspondence between the Institute and the Chapter were read At the request of Mr Bearwald, Chairman of the Exhibition Committee of the San Francisco Architectural Club, their communication of January 15, 1914, was withdrawn, and the Secretary was directed to furnish a copy of the correspondence to the San Francisco Architectural Club

On motion duly made, seconded and carried, the Secretary was directed to furnish the Pacific Coast Architect with the minutes of the Chapter meetings, conditionally on the Chapter being furnished with a special number of copies of the minutes to send to all persons on the Chapter's mailing list, who were not in receipt of that publication

The following resolutions in memory of the late William Curlett offered by Mr Thomas J Welsh, were adopted by a standing vote of the Chapter

IN MEMORIAM.

WHEREAS, By the inscrutable will of Providence our dear brother architect, WILLIAM CURLETT, a member of this Chapter of the American Institute of Architects, has been taken from our circle, and

WHEREAS, In his death our Chapter has lost one of its oldest, best and truest members, one who was faithful in the discharge of every duty intrusted to him, and most highly honored for his professional attainments and achievements which remain as a monument to his memory,

RESOLVED, That in mourning his loss we shall ever revere the memory of a friend who won by his genial personality all with whom he came in contact, and who as a brother architect was most fervent in his love for the profession,

RESOLVED, That we tender our heartfelt condolence to his bereaved family and friends and unite with them in their sorrow

RESOLVED, That when the meeting adjourns this evening, it shall adjourn out of respect to the memory of WILLIAM CURLETT.

RESOLVED, That the Secretary be requested to place these resolutions in full upon the minutes, and to send a copy of same to Mrs. Curlett and family.

ADJOURNMENT.

The Chapter adjourned at eleven o'clock out of respect to the memory of William Curlett.

SOUTHERN CALIFORNIA CHAPTER, A. I. A.

The sixty ninth meeting of the Southern California Chapter of the American Institute of Architects, was held at the Hoffman Cafe, Los Angeles, California, on Tuesday, February 10th, 1914. The meeting was called to order at 7:45 p. m. by Vice President A C Martin, the following members were present:

1. John C. Austin
2. W E. Erkes
3. Frank D. Hudson
4. J W. Krause
5. John P. Krempel
6. A. C Martin
7. S. B Marston
8. B. M. Morris
9. S. T Norton
10. Fernanand Parmentier
11. A F Rosenheim
12. R E. Train
13. P. J. Van Trees
14. J T. Vawter
15. August Wackerbarth
16. Albert R Walker
17. H. F. Withey
18. F R Schaefer

As guests of the Chapter were present: A W Rea, architect, of Joplin, Mo.; John D. Bowler and E. J. Clement of the "Builder & Contractor," and W E. Prine and H. E Hensley of the "South west Contractor."

Minutes of the sixty eighth meeting of members were read and approved.

For the Committee on Ethics and Practice, the Secretary read a report signed by the Chairman, Theodore A Eisen The report referred to charges of unethical conduct against Frederick Norman, member of this Chapter, and exonerated him from such charges on the ground of insufficient evidence

Mr. John C. Austin, moved, seconded by August Wackerbarth, to have the charges against Mr Norman dismissed by the Chapter Mr Austin, however, withdrew his motion, and seconded a motion made by John P Krempel to file the report of the committee Motion was carried

For the Sub Committee on Public Information a summary report was presented by A R. Walker

For the Committee on Entertainment, Mr John P Krempel reported that Mr J T Vawter, a member of this Chapter, would read a paper at the following Chapter meeting Also, in the near future, Prof Montgomery, of the University of Southern California, would read a paper to the Chapter on the subject of electricity and fire hazard.

The Secretary next read a resolution on the death of President R B Young, prepared by the specially appointed committee composed of Messrs J J Backus, John P Krempel and Frank D Hudson On motion made by Mr A F Rosenheim, seconded by Julius W Krause, and duly carried, the resolution was adopted, ordered spread upon the minutes, and an engrossed copy of same ordered sent to the family of the deceased Furthermore, J T Vawter and F R Schaefer were appointed a committee of two to prepare an engrossed copy of the resolution, while the Secretary was instructed to forward a preliminary letter to the family of Mr R B Young

Communications were next read as follows:

From Mr Octavius Morgan, member of the Chapter, who is at present traveling in Europe, presenting his greetings to the members of the Chapter

From the Committee on Quarters of the American Chemical Society, requesting this Chapter to co-operate towards the securing of headquarters for technical societies in Los Angeles This communication was ordered laid on the table and the Secretary instructed to reply

The Secretary was also instructed to communicate with the Secretary of the Institute, requesting the date of the next meeting of the Directors of the Institute in order to advise Octavius Morgan.

The next communication was from Mr. Glenn Brown, expressing his hearty appreciation of a letter forwarded to him from this Chapter on the 14th day of January, 1914.

Two communications from D. Knickerbacker Boyd, Secretary A. I. A., one containing the resolution adopted at the forty-seventh annual convention of the A. I. A., thanking the President, Secretary, members of the Board of Directors and Chairman and members of standing and special committees for the work they had accomplished. The other announcing the appointment of F. Parmentier as a member of the Institute's Committee on Conservation of Natural Resources and Historic Monuments for the year 1914.

Two communications from Mr. C. H. Whitaker, Acting Executive Secretary A. I. A., one containing a resolution that the question of holding the 1915 convention in Los Angeles, would be referred to the May meeting of the Board. The other containing a resolution that the Chapter be requested to communicate with the Secretary of the Institute whenever a Chapter is considering a resignation of one of its members, who is an Institute member.

On motion made by Julius W. Krause, seconded by August Wackerbarth, and duly carried, a committee was appointed to draw a resolution on the death of William Curlett, a member of the San Francisco Chapter A. I. A. The committee appointed is as follows: Frank D. Hudson, W. S. Hebbard, Julius W. Krause.

In view of the recent death of the President of the Chapter, Mr. R. B. Young, Vice President A. C. Martin brought up the question of the election of a new President. A discussion followed and the Secretary was instructed to communicate with the Secretary of the Institute requesting advice concerning the proper method of procedure under the circumstances, on motion made, seconded and duly carried.

Followed discussions regarding the prospective city hall for Los Angeles, and on suggestions made, the President appointed a committee composed of John C. Austin, A. F. Rosenheim and Elmer Grey, to confer with leading Los Angeles citizens interested in town planning and civic improvements, and if possible to induce the same to be the guests of the Chapter at a subsequent meeting.

At the call of the Chairman, A. W. Rae, Architect from Joplin, Missouri, addressed the Chapter with a few remarks.

After various minor discussions, the meeting adjourned at 9:50 p. m.

OREGON CHAPTER, A. I. A.

Meeting held January 22, 1914, at the University Club, called to order by President Whitehouse. The following members answered the roll call: Messrs. Whitehouse, Mayer, Thompson, Doyle, Naramore, Hoffman, Fouilhoux, Beckwith, Allyn, Tobey, Jacobberger and Lawrence. Mr. Chauncey Bunting, architect, from La Grande, Oregon, was a guest.

Minutes of the meeting on December 17th as printed were approved.

Minutes of the executive meeting held January 12th were read and approved.

REPORTS OF COMMITTEES.

1. *Competition Committee*, Mr. Mayer, Chairman.

No definite information was received concerning the reported competition for a Moose Lodge building.

A special committee met the Board of Regents of the State University and argued for a competition. (Note—A special report covering this was submitted by Mr. Whitehouse.)

A competition for a High School at Eugene was conducted contrary to the code. No Chapter member to the knowledge of the committee participated.

At the request of Mr. Brewster, Commissioner of Public Affairs, the committee has drafted a programme for a competition for a Memorial Drinking Fountain to be placed opposite the County Court House.

Ordered filed.

2. *Entertainment Committee*, Mr. Fouilhoux, Chairman.

Requested expressions from the members of the Chapter as to whether or not some entertainment or programme is wise for special dinners.

Ordered filed.

3. *Building Laws Committee*, Mr. Fouilhoux, Chairman.

Reported that Committee on Code Revision has gone as far as Title 20, Part 2, of present code and suggested that it would be helpful if Chapter members would send suggestions as to desirable modifications of the code.

General discussion followed.

Mr. Jacobberger asked when final action was probable on the code, saying that Mr. Plummer, the Building Inspector, held no hope for six months.

Mr. Doyle suggested that sections one at a time might be passed in place of revising the whole code before action was taken by Council.

Mr. Fouilhoux pointed out that housing code was already adjusted and would shortly be before the Council for action.

Mr. Naramore suggested that Building Inspector notify architects when various subjects would be up for discussion.

Mr. Fouilhoux called attention to the policy of the Board established in the recent hospital amendment to the code, which precedent might be followed by the commission in other matters which might be passed by the Council from time to time before the general code revision was complete.

Mr. Lawrence inquired about the legality of the present Board of Appeal. It was pointed out that the present City Commissioners were strongly in favor of the retention of the Board of Appeal.

Mr. Naramore stated that the members of the Revision Committee suggest five members in place of three, dividing the personnel into separate committees of three each to act on specific cases.

Report ordered filed.

4. *Membership Committee*, Mr. Wilson, Chairman.

Reported great difficulty to induce new members to join owing to the present business conditions.

Report ordered filed.

5. *Educational Committee*, Mr. Holford, Chairman.

Your committee has been asked by Mr. Carl Gould, President of the Architectural League of the Pacific Coast, to submit to him any suggestions they might have as to the conduct and award of the scholarship prize.

Your committee begs to submit for your consideration the following suggestions:

1st—Believing that the profession and standards of architecture on the coast at this time can be best advanced by training the average draftsman rather than by further training the man who has already received a training, we recommend that the college graduate be ineligible for this prize.

2nd—As the greatest work of the League should be along educational lines, and as this is carried on by Ateliers doing the Beaux Arts work, we believe every incentive should be given to the draftsmen to do this work, and we therefore recommend that only students who have done at least two regular problems of the Beaux Arts during the year should be eligible for the prize. For the present year two problems might be an excessive requirement as the year is well along, but we believe for this year at least one problem should be required, and hereafter two problems.

3rd—That the age of competitors be limited to 27 years.

4th—That the winner of the prize should be required to spend the money either for travel, study, or study in some school of architecture, that he be required to submit reports to the Educational Committee of the League of work done, and also to send in problems or measured drawings for exhibition purposes. That he be required to outline plan of study or travel, submit same to the above committee and receive approval of same before the Treasurer of the League be authorized to pay over the prize; that the prize money be paid in installments arranged as the committee may deem best for the plan of study decided upon.

5th—We further recommend that if it be possible, copies of these reports be sent to each member of the League to keep alive interest in the work of the League. We feel that it is only justice to the men who have generously subscribed to this fund that they should be informed as to how their money has been expended. We also feel that these reports and required drawings will be beneficial to the winner of the prize. We believe that as soon as possible a copy of the requirements for prize should be sent to each league member and at the first of every school year these requirements be sent to all the Ateliers, so that the students may prepare themselves. If there are any further suggestions that occur to anyone your committee would be pleased to have them before reporting to Mr. Gould.

It was moved, seconded and carried that the report be accepted and the Secretary be instructed to forward same to Mr. Carl Gould, President of the Architectural League.

6. *Committee on Public Information*, Mr. Lawrence, Chairman.

Reported correspondence with the editor of the Journal, Telegram and Oregonian. Through the action of the committee, Senator Chamberlain's bill for facilitating work on federal buildings, which was fathered by the Portland Chamber of Commerce, was called to the attention of the chairman of the National Committee on Public Information.

The report mentions having received the assurance of Mr. Meyers of the Oregonian that he will devote two or three columns in his Sunday real estate news to city planning news and other matters of architectural nature if material for same is furnished him.

Report ordered filed.

7 *Legislative Committee*. Mr Wilhams, Chairman.

Your chairman of your Legislative Committee begs leave to call your attention to a recent decision of the Supreme Court of this state handed down in the case of Hume vs The Seattle Dock Co., in which the Supreme Court upheld the lien of Hume against the Chamber of Commerce building for materials delivered to the factory of the Mackite Fireproofing Co., in North Portland, for the manufacture of plaster partition blocks The Supreme Court intimated in their decision that a logger might maintain a lien on a building under similar circumstances.

It is the opinion of the undersigned that our only and proper remedy against the injustice of the present lien law and various interpretations of the same from time to time by our Supreme Court is the repeal of the same under the initiative at the next state election.

Your attention is also called at this time to a suit brought at the instigation of the Building Inspection Department of this city against the owners of the Congress Hotel building at Sixth and Main streets for maintaining a tar and gravel roofing on wood planking and wood furring above an 8 inch concrete ceiling slab and supported thereon, said roof having been erected in conformity with section 458 of Title XXII (Roofs and Appendages) of the City Building Code, which reads as follows:

"Section 458. A roof, the slope of which is not more than three (3) inches per foot horizontal, and the covering of which is made with a composition of felt and gravel, shall be considered incombustible under the provisions of this Code and may be used upon buildings of all classes; provided that such roofing is not less than four (4) ply for all buildings better than the VI Class. See also section 84."

"Section 84 (Uncombustible Roofing.) A roof covered with not less than three (3) thicknesses of roofing felt and a good coat of tar and gravel, or with tin corrugated iron or other fire-resisting material, with standing seam or lap joint"

Inasmuch as no fire can possibly enter a building through the 8 inch concrete ceiling slab from without or communicate any fire from within the building through the said concrete slab to any adjoining building, it would appear to the undersigned that if there is any question of the present building code not permitting of this construction, that the same should be amended so as to prevent any controversy whatsoever with the department in charge of the inspection of buildings, and he would therefore ask this Chapter to pass a resolution asking for amendment of the Code, said resolution embodying the necessary and proper wording of the said amendment

Mr Doyle moved and Mr Naramore seconded that the report be filed and the section referring to change in building laws be referred to the Building Laws Committee. Motion passed.

8 *Committee on Professional Practice*. Mr Doyle, Chairman.

"The Committee on Professional Practice wishes to recommend the following schedule of minimum rates:

Residential Work:
10% on first $20,000 of cost
8% on next $30,000 of cost
6% on all above $50,000.

Hotels, Public and Quasi-Public buildings, except office buildings.
6% of cost

Office Buildings costing over $50,000.
5% of cost

Office Buildings costing under $50,000.
6% of cost

Warehouse, Store and Loft Buildings and Manufacturing Buildings.
5% of cost

Alterations—question—fee in proportion to work involved.

"This report is submitted with the idea of getting the matter before the Chapter. If action can be taken at this meeting and instructions given to our committee, a complete schedule can be prepared for adoption at the next meeting."

After general discussion in which Messrs Whitehouse, Foulhoux, Jacobberger and Hoffman participated, Mr Beckwith moved and Mr Foulhoux seconded that the report be filed temporarily and be reconsidered under new business. Motion passed

SPECIAL COMMITTEES

1 *Committee on Quantity Survey*

Mr Hogue, Chairman, absent—no report

2 *Knox Estate Committee*. Mr Doyle, Chairman

Report progress. Urged additional funds if the scheme is to be successful and agreed to aid of property owners along the principal streets. Ordered filed

3 *Special Committee on Competitions*. Mr Whitehouse, Chairman.

"The Committee consisting of Messrs Mayer, Hogue, Lawrence and Whitehouse, appointed by the Chapter at the last monthly meeting, held December 17th at the Commercial Club to confer with Messrs. Bean, Dolph and Dixon of the Board of Regents, University of Oregon, in regard to the selection of an architect for the proposed buildings, was held in the office of Judge R. S. Bean on the evening of December 19th

"A very interesting meeting was held for the competition and the Chapter's Committee did everything possible in their discussion with the Regents' Committee that a competition in accordance with the American Institute of Architects' competition code would be the most satisfactory method of procedure for the selection of an architect. The expense and delay was looked upon by some of the Regents' Committee as a handicap, owing to both the limited amount of money that was to be expended on the buildings and the cramped conditions of the quarters of the administration building.

"In regard to the expense our committee had Mr Lawrence, our Secretary, read the telegram that was received from M. B. Medary, Chairman of the Standing Committee of Competitions, A. I. A., in answer to our President's telegram about advice on possible competition, including 5% per cent fee In regard to delay our Committee thought that little time would be lost on competition methods and the Board of Regents would gain, as they would receive many schemes and these would undoubtedly be better studied, than those that would be in a shorter period.

"There were many other points that were discussed and a very pleasant spirit was shown by the Board in wishing to do everything in their power to recognize our Chapter.

"In closing this report our committee feels even though we were not granted a competition, we have gained a great deal in the past conference, as the Chapter was well received and recognized by the Honorable Board of Regents of the University of Oregon, and feel, as explained in the letter to our President from the Chairman of the Regents' Board, Judge Bean, that we had one or two members favoring a competition, and furthermore, we feel that the past conference held with them will set a precedent for future discussions as regards matters of public importance with members from either Municipal or State Boards."

Ordered filed.

4 *Committee on Mr Logan's resignation* Mr Beckwith reported

"The Committee appointed by the President at its last regular meeting wishes to report regarding the resignation of Mr Logan

"He deeply appreciates the honor of being requested to reconsider his action, but for purely personal reasons must decline even the most urgent solicitation. Owing to this manifestation by him, we feel that at this time he should be granted his request with our regrets, and so placed on the minutes."

It was moved, seconded and carried that the report be filed and that Mr. Logan's resignation be accepted with regrets

READING OF COMMUNICATIONS

Letter from Glenn Brown was read. Mr Foulhoux moved, Mr. Thompson seconded that a vote of thanks from the Oregon Chapter be expressed to Mr. Brown by the Secretary for Mr Brown's most excellent work for the Institute

Letter from Knickerbacker Boyd thanking the Oregon Chapter for co-operation in Publicity work Ordered filed.

Letter from the American Federation of Arts in regard to exhibition of Beaux Arts Society work referred to Educational Committee

Letter from the American Art Journal asking for data concerning the Chapter was acknowledged by the Secretary

The first number of the Quantity Surveyor and an accompanied article by C. Alexander Wright was referred to the Committee on Quantity Survey

Report of December meeting of the Michigan Chapter received Ordered filed

List of members and officers of Washington Chapter received Ordered filed

NEW BUSINESS

It was announced by President Whitehouse that Mr Johnson, as Chairman, assisted by Messrs Beckwith and Holford would act as a special committee from the Chapter to and the Architectural Club in its financial relations to Chapter members

Mr Foulhoux asked to hear from Mr Bunting of La Grande on the rate question Mr Bunting remarked that from the general discussion of the report of the Committee on Professional Practice that apparently there were two questions which would never be settled definitely They were fees for residential work and alterations He stated that in 20 cases representing residential work conducted by him during the past year he did not lose one on account of rates He had quoted 10% against a much lower charge asked for by other architects in his locality He pointed out that architects in outlying towns were obliged to pay higher salaries for

competent draftsmen. While he could not afford to do residential work for less than 10% in La Grande, he might not make more profit than that of local practitioners in Portland charging 7½%. Mr. Bunting expressed his wish to co-operate with the Chapter and extended a cordial invitation to the architects to attend the Convention of the Oregon State Retailers' Association, which would take place in La Grande. Mr. Bunting spoke of the desirability for the architects to attend such meetings of business men in order to enhance the prestige of the architectural profession. President Whitehouse expressed the thanks of the Chapter to Mr. Bunting.

Report on Professional Practice was open for discussion, and a long debate resulted in which all members present participated.

Mr. Thompson finally moved that report be changed by the Committee adopting the heading of the New York Chapter's schedule of charges and authorizing the committee to submit the schedule thus revised to all members of the Chapter for letter ballot.

Mr. Hoffman moved and amended that a flat charge of 7½% for residential work inside the city in which the practitioner resides be substituted for the schedule suggested by the Committee. This amendment was seconded by Mr. Lawrence, approved by Mr. Thompson and carried by the meeting.

Mr. Fouilhoux seconded Mr. Thompson's motion as amended.

Mr. Beckwith moved and Mr. Hoffman seconded an amendment to Mr. Thompson's motion eliminating all references for the present to office buildings, warehouses, store and loft buildings and manufacturing buildings. This amendment was accepted by the makers of the original motion and duly carried. Original motion as amended was then put and carried.

Mr. Doyle asked for the help of the members of the Chapter in solving the architectural features of the Rose Festival.

Mr. Whitehouse spoke for harmony in the Chapter and urged that all members co-operate with the Executive Committee in matters of policy, urging frank, outspoken criticism of all actions taken by the Executive Committee.

Mr. Beckwith spoke concerning the Architectural Club rooms, stating that $2000 had been invested in the rooms by the Club and an additional $1800 spent to date for rent and incidentals. He pointed out the fact that the Club would shortly be compelled to give up the quarters. Owing to lack of support it seemed wise to consider the abandonment of the present quarters, and Mr. Beckwith asked that the Chapter members interested attend a meeting of the Executive Committee of the Architectural Club on January 23rd, which was to be held to discuss the matter.

Mr. Doyle moved and Mr. Thompson seconded that meeting adjourn. Motion carried.

COLORADO CHAPTER, A. I. A.

The regular monthly meeting of the Colorado Chapter of the American Institute of Architects was held at the Shirley Hotel, February 2nd, 1914, together with the monthly luncheon. The meeting was called to order at 12:15 o'clock by the president, Mr. George H. Williamson.

The following members were present: Messrs. Williamson, Marean, Huntington, Willison, Manning, Cowe, Harnois, Bettcher and W. E. Fisher. Mr. Irwin J. McCrary, landscape architect, was also present.

Minutes—The minutes of the regular meeting of January 5th were read and approved.

Standing Committees—There was nothing to report from any of the Standing Committees, but the President expressed the wish that the matter of the plumbing ordinance be advanced by the Plumbing Ordinance Committee.

Communications—The following communications were received and ordered placed on file.

From Mr. Robert S. Rooschlaub, our esteemed former president, an interesting letter expressing his pleasure in receiving the Chapter's Christmas remembrance. A communication from A. A. Baerresen offering his resignation as a member of the Chapter. A letter from Mr. R. M. Hooker, business manager for the American Institute Journal, enclosing bill for the subscriptions for each member of the Chapter, and also an interesting letter from Mr. Glenn Brown, for fifteen years the secretary of the American Institute of Architects, expressing his appreciation of the pleasant relations with the different Chapters during his regime.

Unfinished Business—There was no unfinished business from the last meeting

New Business—The Secretary was directed to send a communication to Mr. Glenn Brown, thanking him for his farewell letter and his kindly remarks for the pleasant relations between our Chapter and the Secretary's office, during his administration. Regarding the subscriptions to the Institute Journal the general wish was that the Journal should be continued, to be paid out of the Chapter's funds as formerly. It was also suggested that the attention of the members be especially called to this matter and endeavor to decide if they were sufficiently interested to receive the magazine. Mr. Willison called attention to the fact that as Messrs. A. J. Norton and Arthur A. Fisher were now abroad it would be a pleasure to receive a letter from them, to be read before the Chapter, to be of an informal nature and they would, no doubt, be of much interest for some of our meetings. A motion to this effect was made by Mr. Harnois and seconded by Mr. Manning. The President suggested that the next regular business meeting be dispensed with, and a sort of jollification meeting be substituted, and it was decided to hold the next meeting on March 7th, 1914, at the office of the Secretary, when it is expected that all dignity and reserve be left at home and a good time contemplated. The entertainment committee expects to pull off some real stunts and if all the local members of this Chapter are not present they will be regarded as dead ones unless they can furnish a good excuse.

The regular Entertainment Committee, with the addition of Messrs. Marean and Bettcher (added to this committee by the President), will have charge of the entertainment. It is the desire that each member shall bring a friend, so everybody get in the game.

TACOMA ARCHITECTS.

Tacoma Society of Architects at its last annual meeting elected the following officers: Luther Twitchell, president; S. C. Irwin, vice-president; R. E. Rorhek, secretary-treasurer, and President Twitchell as mediator.

The officer of mediator is a new one and is charged with the duties and responsibilities of the settlement of ethical disputes between architects, and between architects and clients, and to act in the general capacity of arbiter.

SAN FRANCISCO ARCHITECTURAL CLUB.

At the regular monthly meeting of the San Francisco Architectural Club, held in the club rooms, 126 Post Street, last Wednesday evening, February 4, Architect W. B. Faville, Architect Edgar A. Mathews and Architect Tobias Bearwald were each presented with a handsomely carved pair of book stands as a token of the Club's appreciation of their services rendered during the last Annual Architectural Club Exhibit.

The presentation was made by President George Greenwood. Mr. Mathews and Mr. Bearwald expressed themselves as being in hearty accord with the spirit of the Club's Annual Exhibit and offered any further aid which they might give in the next exhibit. Mr. Faville, who was unable to attend, replied by letter in the same spirit.

Routine business, consisting of reading the minutes of the regular business meeting and the Directors' meeting following. About forty members were in attendance.

WILLIAM CURLETT

William Curlett, one of the pioneer architects of California, died Wednesday, January 21, 1914, at his home in Menlo Park, near San Francisco. Mr. Curlett was a member of the San Francisco Chapter, A. I. A., and also chairman of the Advisory Board for Designing and Building of the Panama-Pacific Exposition, and formerly President of the State Board of Architecture. Business will be continued by his son.

ROBERT B. YOUNG

After an illness of five months, Mr. Robert Brown Young, prominent Architect, President of the Southern California Chapter of the A. I. A., died at his residence on January 29th. Mr. Young was the senior member of the Architectural firm of R. B. Young & Son, and for many years was a member of the Southern California Chapter. He was for two years Vice-President, having been elected President on October last. The firm of R. B. Young & Son will continue under the firm name with his son, Frank W. Young, in charge of the business.

ERNEST M. HOEN

Ernest M. Hoen, of Sacramento, California, who for twelve years has been associated with the Architectural firm of Seadler & Hoen, died in January. Mr. Hoen was 43 years of age and was well known in his home city, having practiced his profession for twenty-two years.

FERDINAND MARTENS

Ferdinand Martens recently died of heart failure after a successful career in the Architectural Profession. For the last eight years Mr. Martens has practiced his profession alone, but previous to that time was a member of the firm of Martens & Coffey of San Francisco.

PROGRESS IN BRICK BUILDINGS.

In the detailed statistics of the clayworking industry of 1912, which is a bulletin of advanced chapters from mineral resources of the United States by Jefferson Middleton and J. H. Hance, there is a chapter and a series of tables devoted to the building industry in which there is told a part of the story of the progress of brick in the building operations.

The figures were tabulated from 143 cities throughout the United States, showing for these cities a total in building operations of $919,809,054. This is more cities than there were detailed reports from in 1911, consequently there is no getting at comparative figures for the total number. However, there is a table given showing the shorter list of cities for 1911, and also the building operations in these cities for 1912, which shows a gain of nearly 100,000,000 as compared to 1911. Two cities in the East had an increase of over 100 per cent in the building operations. They were Fall River, Mass., and Lowell, Mass. Also, Rochester, N. Y., and Kansas City, Kans., had an increase of over 100 per cent.

Of the 143 cities reporting, 105 of them gave enough definite detail to permit the publication of the statistics of building by classes of structure. The 105 cities so reporting had a total of building operations amounting to $660,440,573, of which nearly 90 per cent was new work. Taken by classes, the wooden buildings represented 24.43 per cent of the total cost, the brick buildings 52.75 per cent, and all other new buildings, including cement and stone, 11.22 per cent. Of all the new buildings reporting, 72.37 per cent were fire-resisting buildings. Of the fire-resisting buildings, 82.48 per cent was brick, 1.4 per cent was stone, 8.34 per cent was concrete and 7.78 per cent was other fire-resisting material.

The average cost of new wooden buildings was $2,011, of new brick buildings $13,625, of concrete buildings, $28,880, of stone buildings $32,144.

The first interesting thing in connection with these figures is in the fact that more than half of the buildings in the cities reporting were brick buildings. It justifies officially brick as the leading building material in the United States because the brick used for building operations—that is, brick and other clay products—amounts to more than the combined total of all other classes of building material. This should make every clayworker carry his head a little higher and feel good over the fact that he is a clayworker, and the additional fact that things look mighty good ahead for the clayworking industry to be a still bigger factor in the building operations of the country.

Concrete, for all its advertising and hurrah, represents only about 8.34 per cent of the total cost of new buildings. There was, of course, considerable concrete used otherwise in building operations. Concrete enters more extensively than any other building material for the foundations of wooden buildings, and at times it enters under brick buildings. When it comes to the erection of complete buildings, concrete is the smallest item on the list with the single exception of stone.

In the matter of foundations it is but justice to the brick industry that the report makes note of the fact that in addition to the brick used in new buildings and for repairing buildings, large quantities of brick are used in foundations and chimneys of wooden buildings and other fire-resisting buildings. Indeed, it is perhaps safe to say that there is as much brick used in chimney and foundation work as there is concrete, so the honors are even, and the comparison will stand as 5.279 per cent of brick and 8.34 per cent of concrete.

Of the larger cities in this list, only two showed a decrease in the amount of fire-resisting building done, and these two were Cleveland, Ohio, and Kansas City, Mo. In practically all other of the cities reporting there was an increase in the use of brick and other fire-resisting material.

These statistics should be an object lesson to arouse the people in Cleveland and in Kansas City and beget a campaign of brick boosting that will put those cities among the users of more brick. It is an interesting bunch of statistics all the way through, and every brick manufacturer should write to the United States Geological Survey for this special bulletin on the clayworking industries, not only for the sake of making a study of the clayworking industries themselves, but also to get for study and reference these statistics on the building operations in the leading cities of the country. This is being made a feature of the clayworking industries' reports now, and each year it will be a more important feature, and every clayworker should have the report before him for reference.

The report, as a whole, shows that in the leading cities throughout the United States brick is making excellent progress in the building operations. It will keep making more progress here, too, and meantime this should lend prestige to the boosting of brick in the smaller cities and country towns, until they, like the larger cities, will show that the major part of their building operations consist of brick and other clay products. —Written for The Clay-Worker.

Business Getting

The first law of advertising is to tell people what your business is.

The second law is to tell them how well you are equipped to do business for their benefit.

The third law is to tell where you do business.

You cannot expect your advertisement to convince everybody.

You cannot expect your advertisement to be read by everybody.

You cannot expect to get all the business, because the minute you did get it all you couldn't handle it and would therefore lose it.

You have a right to expect that your advertisement will be read by somebody.

You can expect that your advertisement will convince somebody.

You should therefore write every advertisement so that it will convince somebody when somebody reads it.

If you do this, you will get all the business you deserve, and that's all you need to be successful.

Taking Care of Business.

More business men have failed because they could not take care of the business they got than because they couldn't get the business in the first place.

Aim for simplicity.

The hardest thing in the world to do is to be simple.

Every unnecessary thing you do adds to your labor. There is a tendency to do many things fairly well in the place of doing one thing as it should be done.

Doing the things we don't have to do is why we have to do so many things we don't want to do—we don't do them well and the business gets away from us and goes to the man who does them well.

Trade Notes.

Architect Del W. Harris, of San Diego, is now located at his residence, 520 Twentieth Street.

Architect H. M. Banfield, of Pasadena, has moved his office to 315 Kendall Building, Pasadena.

Architect H. D. Fisher has opened office at Twin Falls, Idaho. Mr. Fisher was formerly at Boise, Idaho.

LaMott-Cook Co., architects, moved from 916 Rialto Building into larger quarters at 432 Rialto Building.

Architect John Baur has moved his office from 701 Clune Building to 519 Sharon Building, San Francisco.

Architect Harlan Thomas has moved his offices from the Eilers Building, Seattle, to 4104 Arcade Building.

Architect V. O. Wallingford has joined offices with Edwin T. Banning at 624 Timken Building, both of San Diego.

Architect Lester H. Hibbard announces the opening of his office at 722 Marsh-Strong Building, Los Angeles.

Jake A. Knapp of the architectural firm Veghte & Co., Klamath Falls, Ore., is spending the winter months in San Jose.

Architect T. Thoresen, formerly at 425 Los Angeles Inv. Bldg., Los Angeles, Cal., has moved his office to Gooding, Ida.

Architect C. C. Dakin has moved his office to 501 French Bank Building, formerly at 268 Market Street, San Francisco.

Architects Fox & Berrill, of Broad Street, Victoria, are making arrangements to open a branch office at Alberni, Canada.

Architect J. H. Bowman has moved his offices from the Crown Building to suite 910-11 Yorkshire Building, Vancouver, B. C.

Architects Mead & Requa, of San Diego, have moved from 441 McNeece Building, to the third floor of the Hill Block.

Architect Miles S. Farwell moved his office from Sayward Building, Victoria, B. C., to 416 W. Lee Street, Seattle, Wash.

Architect A. W. Rea, of Joplin, Mo., while in Los Angeles made a short address before the Southern California Chapter, A. I. A.

Architect J. C. Hillman of Pasadena, has moved his offices from the Chamber of Commerce Building to 601 Central Building, Pasadena.

Architect Atlee B. Ayres, San Antonio, Texas, is on a trip around the world with his family and will not return until some time in June.

Mohrlite Co. has just completed a Mohrlite installation on the three floors of the building occupied by the California Insurance Co.

Architect William Carver has opened offices in Phoenix, Ariz., and would be pleased to receive samples and catalogues from manufacturers.

Architect DeForrest Howrey has moved his office to the third floor of the Marsh-Strong Building, formerly at 1036 Van Nuys Building, Los Angeles, Cal.

F. D. Wolfe & Son, architects, San Jose, moved into their new quarters at 212 First National Bank Building, which is double the space they had previously.

Architect R. B. Christensen, formerly in the Grant Building, San Francisco, has become associated with M. G. Bugbee with offices in the Lick Building.

Architect C. W. Dickey, of Oakland, is on an extended trip through the east on business referring to the structure to be built at Washington and Fourteenth Streets, Oakland.

Steiger Terra Cotta & Pottery Works furnished the terra cotta used in the Underwood Building, erected a short time ago on lower Market Street, San Francisco.

Mr. O. H. Mohr, president of the Mohrlite Co., has left for an extended business trip through the East in the interest of "Mohrlite." He will return about the middle of March.

Architects S. B. Marston and G. B. Van Pelt, Jr., Pasadena, have become associated under the firm name of Marston & Van Pelt with offices at 600 Chamber of Commerce Building, Pasadena.

Architect W. H. Parker, formerly of Parker & Kenyon, is now at 641 Holbrook Building. The firm name is now W. H. Parker Co. Mr. Kenyon is no longer connected with the firm.

Architect Frank Lloyd Wright, Jr., landscape architect, recently of Chicago, has become associated with Architects Montgomery & Montgomery, 805 Trust & Savings Building, Los Angeles.

Mr. C. L. Johnson, special representative of The Atlas Portland Cement Co., New York City, is making his annual coast trip and recently passed through San Francisco enroute for the southern states.

Architect Octavius Morgan, of Los Angeles, is still in Europe. The Southern California Chapter, A. I. A., having received a recent communication from him, which was read at their monthly meeting.

The Municipal Art Commission of Los Angeles organized for the ensuing year by electing: John W. Mitchell, president; Architect A. F. Rosenheim, vice-president, and F. W. Blanchard, secretary.

Architects Green & Finger, of Houston and Galveston, Texas, have dissolved partnership, Mr. Finger opening offices in the National Bank Building, Houston, and Mr. Green retaining the former location.

Blanchard, Green & Tifal have opened architectural designing office at 1036 Van Nuys Building, Los Angeles. Mr. Blanchard is from Portland, Ore., and Mr. Tifal from Monrovia, Cal., and Mr. Green from Los Angeles.

The architectural firm of Bebb & Mendel, Seattle, Wash., has been dissolved, and Mr. Bebb is retaining offices in the Denny Building, where the firm was formerly located. Mr. Mendel has taken offices in the Oriental Building.

N. Clark & Sons have recently furnished the Mat Glazed Architectural Terra Cotta in the Polychromic for the Y. W. C. A. Building in Oakland. Julia Morgan was the architect. They also furnished the face brick in a warm brown tone.

Architect Norman F. Marsh, Los Angeles, has closed his branch office at San Diego, Cal., removing the same to Phoenix, Ariz., to be opened about March 1st. This change was made owing to the work Mr. Marsh has in the Arizona territory.

His Grace Archbishop Legal, of St. Albert, head of the Edmonton diocese, Edmonton, Canada, announces that a cathedral costing about $300,000 will be erected there next year. It is also proposed to build thirteen churches in various parts of the city.

Mr. Barnett, senior member of the firm of Architects Barnett, Haynes & Barnett, with offices in St. Louis and Los Angeles, recently spent some time in the West where they are looking over the field for some work anticipated by an eastern company.

Architect C. H. Russell, recently of San Francisco and formerly at 928 Security Building, Los Angeles, has opened an office to be known hereafter as C. H. Rusell Co., Inc., with offices at 500 Union League Building, Los Angeles. Mr. Russell has closed his San Francisco office.

Architect W. R. B. Willcox, Central Building, Seattle, has been east attending a meeting of the Board of Directors of the American Institute of Architects, Washington, D. C. Mr. Willcox is a new member of the board, having been elected at the annual convention held in New Orleans.

Architect James Gilmore has located in Prince Rupert, B. C., and will practice his profession there. Mr. Gilmore designed the Carnegie Library Building in Cincinnati, where he was in business for several years and is also a graduate of the National Italian Architectural School of Rome.

Henry W. Hill, prominent architect of Chicago, visited San Francisco on his return from Mexico City. Mr. Hill had some exciting experiences while in Mexico and at one time was advised to leave the country by John Lind. He was also witness to some of the battles occurring in that vicinity.

Architect G. Albert Lansburg, of San Francisco, left the first of February for a trip to Salt Lake City and to Kansas City, Mo. The latter place he will remain for some weeks, where he has the new Orpheum Theater under construction. This building is the finest of the entire Orpheum Circuit.

Architect John T. Comes, of Pittsburgh, Pa., is the architect for the new St. Vincent Church at Los Angeles, Cal. He states it will be finished before the end of 1915. The cost is over $250,000 and occupies a ground space of 258 feet by 350 feet, with a seating capacity in the main auditorium of over 1300.

The school board of Vancouver, B. C., has appointed a consulting architect for all new work on a percentage basis. While there were a number of applicants for the position, Mr. E. Sonnichsen, formerly identified with the architectural firm of Somervell & Putnam, of Vancouver, B. C., has been appointed to the position and has opened offices at 315 Crown Building, Vancouver, B. C.

Architect W. J. Dodd, who about a year ago moved his office from St. Louis, where he was connected with the firm of McDonald & Dodd, to Los Angeles, Cal., and became associated with another Los Angeles architect, has entirely severed all connection with the latter company. Mr. Dodd is now located at 321 Marsh-Strong Bldg., Los Angeles, and has no connection whatever with any other architect.

The architectural firm of Wyss-Thalman Co., Inc., with offices at 1010 Hewes Building, San Francisco, is a new company in the field. Mr. V. Wyss Thalman and Gothard Wyss are architects formerly of Pittsburg, Pa. The other two members of the firm are Carl Nuese and James S. Arnot, the latter from Victoria, B. C. This will be the main office of the company and branches will be maintained in New York City and Pittsburg, Pa.

Architect G. Alexander Wright, 571 California St. has recently returned from an extensive tour throughout the United States, lecturing in the interest of Quantity Surveying, of which he is the originator or pioneer in perfecting this system of estimating quantities in the United States. He has carried on this campaign at his own expense, and has published considerable literature which contains marked merit, and Mr. Wright's efforts have proven wonderful fruit, and he should be commended very highly for them.

The National Mill & Lumber Co., who are now building the Pitcher patented disappearing door, formerly sold by the Pacific Pipe & Tank Co., reports sales for a large portion of the apartment house now in the course of erection. The architects and builders are fast realizing the great advantage derived by using sliding doors throughout a building in place of the old-fashioned swinging door, both as a matter of space and economy. Numerous apartment houses and hotels are now being erected with specifications calling for sliding doors as finished by the National Mill & Lumber Co., and who also can install sliding doors throughout the building without any change of plans.

The Pacific Face Brick Company, of Portland, have recently closed a contract for the face brick to be used in the large Jewish Synagogue to be erected in Seattle, Wash. This is to be faced with their impervious white plastic brick. This company is also furnishing the face brick for the R. L. Glisan building at Fifth and Couch Streets, Portland. The Costello building at Fourth and Burnside, the Yeager building in Lents, the A. L. Parkhurst building at Second and Couch Streets and are also finishing up their shipments for the Hoquiam (Wash.) school building. This company reports some good prospects in the building line for the Northwest this spring and state that there is a great deal of activity toward the erection of several large buildings in their territory.

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The San Francisco Architectural Club have completed arrangements and are now active in preparing for the National Architectural Exhibition to be held in San Francisco during the time of the Panama-Pacific International Exposition in 1915.

We will naturally expect the individual co-operation of every architect, particularly on the Pacific Coast, in supplying the exhibition with the best work he has produced, so that it may be exhibited to the thousands who will be in San Francisco at that time.

It is our intention to issue a very elaborate Year Book in conjunction with the exhibition, and it will contain reproductions of the work on exhibition that is selected by the committees appointed in the various cities of the United States.

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CALIFORNIA

Commercial Building—San Francisco. Architect Lewis P. Hobart, Crocker Bldg., has been selected to prepare plans for the new commercial structure to be erected for the Firemen's Fund Insurance Co. The building is to be ten stories in height, Class A construction, and will cost $500,000.

Hotel—San Francisco. Architect G. A. Applegarth, Call Bldg., is now taking figures on work on the fourteen story Class A structure to be erected by the Clift Estate at the southeast corner of Geary and Taylor Sts. The building will cost $450,000 and will be one of the largest hotel structures in the city.

Hotel—Oakland. Architect C. W. Dickey, Central Bank Building, Oakland, is preparing plans for a seven story and basement reinforced concrete hotel building to be erected for Frank Bilger on the north side of Sixteenth Street, between San Pablo and Telegraph Avenues, Oakland. Estimated cost $110,000.

Hall of Records—Merced. Architect C. H. Russell, Union League Building, Los Angeles, has completed plans for a two-story and basement Hall of Records for Merced County, to cost $40,000.

Building Addition—San Francisco. Architect Charles Paff, Merchants' Exchange Building, has been commissioned to prepare plans for an addition of three stories which will be made to the Andrew B. McCreery Estate Building, located on the north side of Pine Street, between Sansome and Montgomery, and will cost $50,000.

Exposition Building—San Francisco. Architect G. F. Freeman of London has completed plans for the Canadian Building at the Exposition. It will cost $300,000 and will be the largest exposition building ever erected by Canada.

Exposition Building—San Francisco. Architect A. F. Heide, 46 Kearny Street, has completed preliminary plans for the Washington State Building approved by the Panama Pacific Commission for the State of Washington, at a cost of $65,000.

School—San Francisco. Architects Shea & Lofquist, Bankers' Investment Building, have plans under way for a three story reinforced concrete school building, which is to be erected for St. Paul's Church on their property at the corner of 29th and Church Streets. The structure will cost $70,000.

Apartment House—San Francisco. Architects Ward & Blohme, Alaska-Commercial Building, have prepared preliminary plans for a high class apartment house to be erected in the Nob Hill District. It is to be a Class A construction and will cost in the neighborhood of $200,000.

Exposition Building—San Francisco. Architect Alfred I. Coffey, Humboldt Bank Building, has prepared preliminary plans for an oriental exhibit which is to be erected at the Panama-Pacific Exposition. It will cost $50,000.

School—El Centro. Architect Fred T. Harris, Holt Building, El Centro, has completed plans for the construction of a one-story and basement brick School Building to be erected at this place at a cost of $30,000.

Church—Fresno. Architects Swartz, Hotchkins & Swartz of Fresno have associated with Flanders & Flanders in designing the First Christian Church of Fresno, which is to cost $75,000.

Infirmary—Alameda. Architect Charles Peter Weeks, Mutual Bank Building, is making every possible effort to complete plans and specifications for the proposed Alameda County Infirmary. This big institution will cost in the neighborhood of $1,000,000.

Store and Apartment House—San Francisco. Architect J. R. Miller, Lick Building, is preparing working drawings for a large Class C store and apartment house which will be erected on the property of the San Christina Investment Company, at the corner of Sixteenth and Howard Streets.

Apartment House—San Francisco. Architect Mathew O'Brien, Foxcroft Building, San Francisco, is preparing plans for a three-story and basement apartment house to be erected at the corner of Devisadero and Duboce Streets. The building will be of reinforced concrete and will cost $60,000.

Apartment House—San Francisco. Architects Rousseau & Rousseau, Monadnock Building, have prepared plans for a four-story and basement reinforced concrete apartment house to be erected on the south side of Post Street, west of Larkin, and to cost $32,750.

Church—San Francisco. Architects Shea & Lofquist, Bankers' Investment Building, are completing working drawings for a reinforced concrete church to be erected at the corner of Geary and Eighth Avenue, for the Star of the Sea Church. The building will cost $50,000.

Residence—San Francisco. Architect Frederick H. Meyer, Bankers Investment Building, is preparing working drawings for the erection of a three-story and basement Class A construction residence for I. W. Hellman, Jr., to be erected on the corner of Broadway and Broderick Street, and to cost $150,000.

School—Glendora. Architect Norman F. Marsh, Broadway Central Building, Los Angeles, is preparing plans for the construction of a one and two-story brick school to cost $65,000.

City Hall—San Mateo. Architect Havens & Toepke, 46 Kearny Street, San Francisco, have completed plans for the construction of a two-story and basement reinforced concrete City Hall to be erected here, and to cost $40,000.

High School—Inglewood. Architect Norman F. Marsh, 214 Broadway Central Building, Los Angeles, has completed plans for a $150,000 brick high school at Inglewood, Cal.

High School—Venice. Architects C. H. Russell Co., 500 Union League Building, Los Angeles, have completed plans for the erection of a polytechnic high school building at Venice to cost $150,000.

Hotel—La Canada. Architects Eisen & Son, Wilcox Building, have prepared plans for a large tourist hotel to be erected at La Canada and to cost $200,000.

School—Morningside. Architect A. C. Martin of Los Angeles will prepare plans for the erection of a grammar school building at Morningside, estimated cost of which is $35,000.

Hotel Addition—Pasadena. Architects Greene & Greene, 215 Boston Building, are preparing sketches for an additional building to be erected on the grounds of the Vista del Arroyo family hotel.

Hotel—Los Angeles. Architect W. J. Saunders, 802 International Bank Building, has been commissioned to prepare plans for a nine-story and basement Class A hotel building, to be erected on the south side of Sixth Street, west of Olive, and to cost from $125,000 to $150,000.

Chapel and Manse—Architect Joseph Bell DeRemer, 624 Title Insurance Building, has working plans for the chapel and manse to be erected at Wilshire Boulevard and Western Avenue, for the Wilshire Presbyterian church under way.

Residence—The Milwaukee Building Co., Wright & Callender Building, is preparing plans and will build a two-story and attic residence for John F. Powers, in Windsor Square, to cost $50,000.

Hotel and Theater Building—Los Angeles. Preliminary sketches are being prepared by Blanchard, Greene & Tifal for the erection of a three-story hotel and theater building on the Palomares Hotel site at Pomona, to cost $150,000.

Hotel—Los Angeles. Chas. Gordon, L. A. Investment Building, has prepared plans for the twelve-story reinforced concrete hotel building to be erected on Spring Street betwen First and Second Streets, and will cost $300,000

Office Building—Los Angeles. Preliminary plans for the twelve-story and basement steel frame bank and office building to be erected at the corner of Spring and Fifth Streets, for the Commercial Fire-Proof Building Company, have been prepared by architects Parkinson & Bergstrom.

Apartments—Los Angeles. Architect Leonard L. Jones, 236 I. W. Hellman Building, is preparing plans for a four-story and basement Class C brick apartment house, to be erected on Fremont Avenue between Third and Fourth Streets, for Chas. W. Howard, and to cost $40,000.

OREGON

Hospital—Portland. Architects Tourtelotte & Hummel, Rothchild Building, have prepared plans for the construction of the Emanuel Lutheran Hospital which is to be erected at Commercial, Graham and Forty-fifth Streets, and will cost $45,000.

Apartment—Portland. Architects Claussen & Claussen, Macleay Building, have been commissioned to prepare plans and specifications for a large apartment house to be erected at Fifteenth and Lownsdale Streets, for Mrs. C. Brown.

Church—La Grande, Ore. Architects Houghtaling & Dougan have been commissioned to prepare plans and specifications for a large church and parish house for the Church of Our Lady of the Valley at La Grande, Ore., of which Rev. Father P. J. Driscoll has charge.

Hotel Addition—Pendleton. Architects Tourtelotte & Hummel, Rothchild Building, Portland, have completed plans for work on a brick and steel hotel addition to cost $140,000.

Church—Portland. Architect Geo. Foote Dunham, Lumbermen's Building, Portland, is completing plans for work on the church to be erected at the corner of East Sixth Street and Holladay Avenue, for the First Christian Science Church of Portland.

School—The Dalles, Ore. Architect C. K. Crandall, The Dalles, has been commissioned to prepare plans for the erection of a two-story and basement brick and concrete school structure to cost $100,000.

Hospital—Roseburg. Plans for the new county infirmary to be erected on the land acquired by the County from the County fair grounds have been prepared by Architect F. C. Flagler.

Hotel—Sutherlin. Architect Earl A. Roberts, Selling Building, Portland, is preparing plans for a two-story and basement brick hotel for F. B. Waite, at the cost of $30,000.

School—Corvallis. Architects Doyle & Patterson, Worcester Building, Portland, have been commissioned to prepare plans for a two-story and basement brick or reinforced concrete for the City of Corvallis at a cost of $60,000.

Bath House—Seaside. Architects Doyle & Patterson, Worcester Building, have prepared plans for a one-story reinforced concrete Bath House for Mr. J. E. Oates at a cost of $25,000.

Public Building—Eugene. W. C. Knighton, state architect of Oregon, is making plans for the administration building for Oregon State University at Eugene, the cost of the building to be about $100,000. Lawrence and Holford, architects, Portland, have been engaged to draw plans and sketches and lay out campus grounds for the institution.

Lodge—Pendleton. Preliminary plans have been prepared by Tourtelotte & Hummel, architects, Rothchild Building, Portland, for the construction of a two-story addition to the Elks' lodge at the cost of $35,000.

Apartment—Portland. Architects Goodrich & Goodrich, Abington Building, Portland, have prepared plans for a two-story and basement frame apartment house to be erected on the East Side at a cost of $15,000.

Convent—Portland. Architect Jacob Javoberger, Board of Trade Building, Portland, has completed plans for a three-story and basement concrete and hollow tile construction Convent for the Sisters of the Holy Child at Portland at a cost of $20,000.

WASHINGTON

Hospital—Lakeview. Architects Sundberg & Mahon, Tacoma, have completed plans for a two-story and basement hollow tile construction Hospital for Pierce County, at a cost of $30,000.

Hotel—Seattle. Architect William Kingsley, Empire Building, Seattle, has been commissioned to prepare plans for a twelve-story and basement hotel, Class A construction, to cost $1,000,000.

Apartment—Seattle. Architect W. H. Milner, Arcade Building, is preparing preliminary sketches for a four story and basement brick apartment house on Marion Street and Summit, for F. F. Adams, at a cost of $45,000.

Cannery—Vancouver. A. M. Baker, Architect, was appointed to draw up plans and specifications for a new cannery to be located near the Union Depot on Hill Street, between Ninth and Tenth, for the Clarke County Growers' Association.

Theater—Tacoma. Architect Max Umbrecht, Seattle, has been commissioned to prepare plans for a four story and basement steel and reinforced concrete Theater for Eugene Levy, Seattle, at a cost of $100,000.

Institutional Building—Medical Lake. Architect Julius Zittle, Jamieson Building, Spokane, has been commissioned to prepare plans for a one and two-story brick and concrete institution for the Feeble Minded.

Bank—Oroville. Architect A. Harlon Thomas, Arcade Building, Seattle, is preparing plans for a two story and basement brick and concrete bank building for the First National Bank of Oroville. It will cost $15,000.

Fire Station and Jail—Seattle. Architect D. R. Huntington, Seattle, has completed preliminary plans for a three story and basement reinforced concrete fire station and jail for the City of Seattle at a cost of $100,000.

Hotel—Seattle. Architect John Graham, Lyon Building, Seattle, has completed plans for a six-story and basement brick and steel hotel for P. J. Murphy, to be erected at the corner of Sixth and Jackson Streets; to cost $700,000.

Apartment House—Seattle. Architect F. H. Bleyhme, New York Building, Seattle, has completed plans for a three story and basement brick apartment house for Frank Logan at a cost of $25,000.

Summer Resort—Walla Walla. The capitalists of this place are planning the construction of a $100,000 summer resort at The Meadows in the Blue Mountain. A hotel and a number of bungalows will be built.

Store Building—Seattle. Architect Chas. H. Bebb, Denny Building, is completing plans for the construction of a two story and basement brick store building for the Horton Estate in Georgetown at a cost of about $30,000.

Apartment—Tacoma. Architects Heath & Gove are preparing plans for a large apartment building to be erected for the Ansonia Realty Co. The cost is placed at $125,000.

State Fair Building—Salem. The State Board has approved the plans of W. C. Knighton, state architect, for a pavilion to be erected on the State Fair Grounds at a cost of $50,000.

COLORADO

Hotel—Sterling. Plans for the erection of a model hotel building is being completed. Estimated cost of construction $100,000.

Theater—Grand Junction. Announcement has been made of the incorporation of the Center Building Development Co., which will erect $50,000 opera house.

Postoffice—Grand Junction. All bids for the $100,000 postoffice building have been rejected by the supervising architect of the Treasury Department of Washington. New bids will be called for.

Laundry—Denver. Architects Marean & Norton have been commissioned to draw plans for a $20,000 laundry for the Western Columbia Laundry Co.

Lodge—Pueblo. The alteration of the Masonic Temple is estimated at $15,000 and the architect states the work will be begun immediately.

Theater—Grand Junction. Report is in circulation apparently with good foundation that there is to be a $50,000 new Majestic Theater erected at Grand Junction.

Residence—LaJunta. Architect Debre has completed plans for $15,000 in improvements for the Cudahy estate. It will be a nine room house, sixteen room bunkhouse, and other buildings.

UTAH

Apartment—Salt Lake City. Work has been started on the $42,000 Midgley Apartment on Temple Street. Architect B. O. Macklenberg is the architect superintending construction.

Factory—Salt Lake City. Architect W. H. Leppner is preparing plans for a manufacturing plant to be erected on State Street for the Wasatch Motor Mfg. Co.

Lodge—Salt Lake City. New lodge building for the Salt Lake Aerie Fraternal Order of Eagles has taken form and the committee in charge will have preliminary plans prepared.

Hospital—Salt Lake City. Architect B. O. Macklenberg has completed plans for a $200,000 addition to the Holy Cross Hospital.

School—Garfield. Plans drawn by E. E. Bjorling of Salt Lake for a $30,000 school house has been accepted by the board. Bids will be called for shortly.

MISCELLANEOUS

School Building—Bishop, Texas. Architect W. J. Ellers of Bishop is preparing plans for four school buildings to be erected at Bishop. Professor Cuccicki of the University of Texas assisting. The main or high school is to be three stories in height and to cost between $40,000 and $50,000, and the others will be one story brick buildings.

Opera House—Glenns Ferry, Ida. Plans for the construction of an opera house to be built by D. W. Corby have been completed by Architects Tourtellotte & Hummell, Boise, Building to be of brick.

Business Block—Cody, Wyo. Architect Curtis C. Clement of Billings, Mont., is preparing plans for the erection of a new business block for the Cody Trading Co., to be concrete and brick construction and to cost $20,000.

Opera House—Lewistown, Mont. An opera house to cost $100,000 and which will have a seating capacity of 700 is to be built here in the spring by allied interest of the Bank of Fergus County.

Hall—Nogales, Ariz. Architect Henry O. Jaasted of Tucson, Ariz., is preparing plans for the erection of a town hall at this place. Building to be two stories high and to cost $20,000.

Hotel—Miami, Ariz. Architect Carl Haggstrom is preparing plans for Mrs. Mary Dow for the erection of a modern hotel building of reinforced concrete.

School Building—New Plymouth, Ida. School Board has proposition under consideration of asking the voters of the school district for bonds for the building of a new school building.

Garage—Idaho Falls, Ida. Architect Dave Dowd has prepared plans for the big new garage building which will be built of white sand brick and stone and will cost $40,000.

Depot—Pocatello, Ida. George H. Smith of Salt Lake City, attorney for the O. S. L., has announced that directors of that road have voted $200,000 for the erection of a three-story depot at this place, work to commence in May.

Hospital—Silver City, N. M. Plans have been prepared for the erection of the Grant County Charity Hospital building by Architects Trost & Trost. Structure will cost $15,000.

Apartment House—Livingston, Mont. Plans have been completed by Willison & Fallis, architects, Ideal Building, for a three-story apartment house to be built on Lincoln Street, between Seventeenth and Eighteenth Streets, to cost $60,000.

Federal Building—Santa Fe, N. M. Inspector John H. Fleming will locate a site for the erection of a new Federal Building at this place to cost $295,000.

High School—Rock Springs, Wyo. Plans have been submitted by Architect D. D. Spani of this city for the erection of the proposed new high school building to be erected this spring. When completed to cost $50,000.

Bank Building—Great Falls, Mont. Architect Henry Hall Johnson, Henry Building, Seattle, has completed plans for a five story and basement bank and office building, steel frame, reinforced concrete, Class A construction, to cost $250,000.

BRITISH COLUMBIA

Office Building—Vancouver. Architect A. A. Cox has prepared plans for the construction of a ten story office building to be erected by Weiler Bros.

Lodge Hall—Vancouver. Architect Emil Guenther, Northwest Trust Building, has been commissioned by the building committee of the Fraternal Order of Eagles to prepare plans and specifications for the erection of their proposed lodge hall and building on Homer Street, between Dunsmuir and Pender. The building will be three stories and basement, of brick construction.

Drill Hall—Vancouver. Architects Perry & Fowler have completed plans for the construction of the proposed Grandview Drill Hall to cost $350,000.

Church Buildings—Vancouver. Architects Sharpe & Thompson, London Building, are now working out detail plans and drawings for the erection of denominational theological college buildings to be erected in conjunction with and on the sites embraced by the proposed University of British Columbia at Point Grey. It is estimated that the cost will be $4,000,000 in the aggregate.

Church—Victoria. Plans are being prepared by Architect Jesse M. Warren for the proposed new edifice for the First Baptist Church, to cost $100,000.

Schools—Victoria. The School Board has accepted the plans of Architects Spurrin & Wilkins for the proposed new Hollywood schools to cost $50,000.

Postoffice—Calgary, Alberta. Plans have been prepared and construction will begin in the spring for the construction of a new postoffice at Calgary, the estimated cost of which is $2,000,000.

School—Burnaby, Canada. Architect J. H. Bowman, Yorkshire Building, states that work will probably be undertaken on Burnaby's proposed eight room concrete school building to cost about $80,000.

Hotel Addition—Juneau, Alaska. Architect Julian Everett, Walker Building, Seattle, has completed plans for the construction of a two story reinforced concrete $15,000 addition to the Juneau Hotel, Juneau, Alaska.

School—Medicine Hat, Alberta. Plans are being prepared by Architects McCoy, Levine & Schuport of Medicine Hat for a brick and stone high school building to cost $200,000.

Public Building—Greenwood. $42,500 has been appropriated for the construction of the Greenwood, B. C. Federal Public Building and work will commence in the spring.

Church—Port Coquitlam, Can. Plans have been completed by Architects Perry & Fowler, Pacific Building, for the erection of a frame church at Port Coquitlam for the Episcopal Church to be known as St. Catharine's.

Theater—Edmonton, Alberta. Architects Anderson Bros. are preparing plans for a hotel and concrete building to be built at Edmonton, and to cost $25,000, for Mr. Geo. Brown, president of the Empire Hotel Co. The same owner will make additions to the Empire Hotel to cost $100,000.

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SPECIFICATION FORM.

TIN ROOFING WORK.

All tin used on this building shall be N. & G. Taylor Co.'s "TARGET-AND-ARROW" brand. No substitute for this brand will be allowed. Use IC thickness for the roof proper, decks, etc., and IX thickness for valleys, gutters and spouts, as required by design. One coat of red lead, iron oxide, metallic brown or Venetian red paint, with pure linseed oil, shall be applied to the under side of the tin before laying.

For **flat-seam roofing**, edges of sheets to be turned one-half inch; all seams to be locked together and well soaked with solder. Sheets to be fastened to the sheathing-boards by cleats spaced eight inches apart, cleats locked into the seams and fastened to the roof with two one-inch barbed wire nails; no nails to be driven through the sheets.

For **standing-seam roofing**, sheets to be put together in long lengths in the shop, cross seams to be locked together and well soaked with solder; sheets to be made up the narrow way in the rolls and fastened to the sheathing-boards by cleats spaced one foot apart.

Valleys and gutters to be formed with flat seams well soldered; sheets to be laid the narrow way.

Flashings to be let into the joints of the brick or stone-work, and cemented. If counterflashings are used, the lower edge of the counter-part shall be kept at least three inches above the roof.

Solder to be of the best grade, bearing the manufacturer's name, and guaranteed one-half tin and one-half lead—new metals. Use rosin only as a flux.

CAUTION: No unnecessary walking over the tin roof or using same for storage of material shall be allowed. In walking on the tin care must be taken not to damage the paint nor break the coating of the tin. Rubber-soled shoes or overshoes should be worn by the men on the roof.

PAINTING TIN WORK: All painting of the tin work to be done by the roofer, using red lead, iron oxide, metallic brown or Venetian red paint, with pure linseed oil—no patent dryer or turpentine to be used.

All paints to be applied with a hand-brush and well rubbed on. Tin to be painted immediately after laying. A second coat shall be applied in a similar manner, two weeks later.

No deviation from these specifications shall be made unless authority is given in writing by the architect. Only a first-class roof will be accepted.

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SAN FRANCISCO
CALIFORNIA

VOLUME SEVEN
NUMBER TWO

APRIL, 1914

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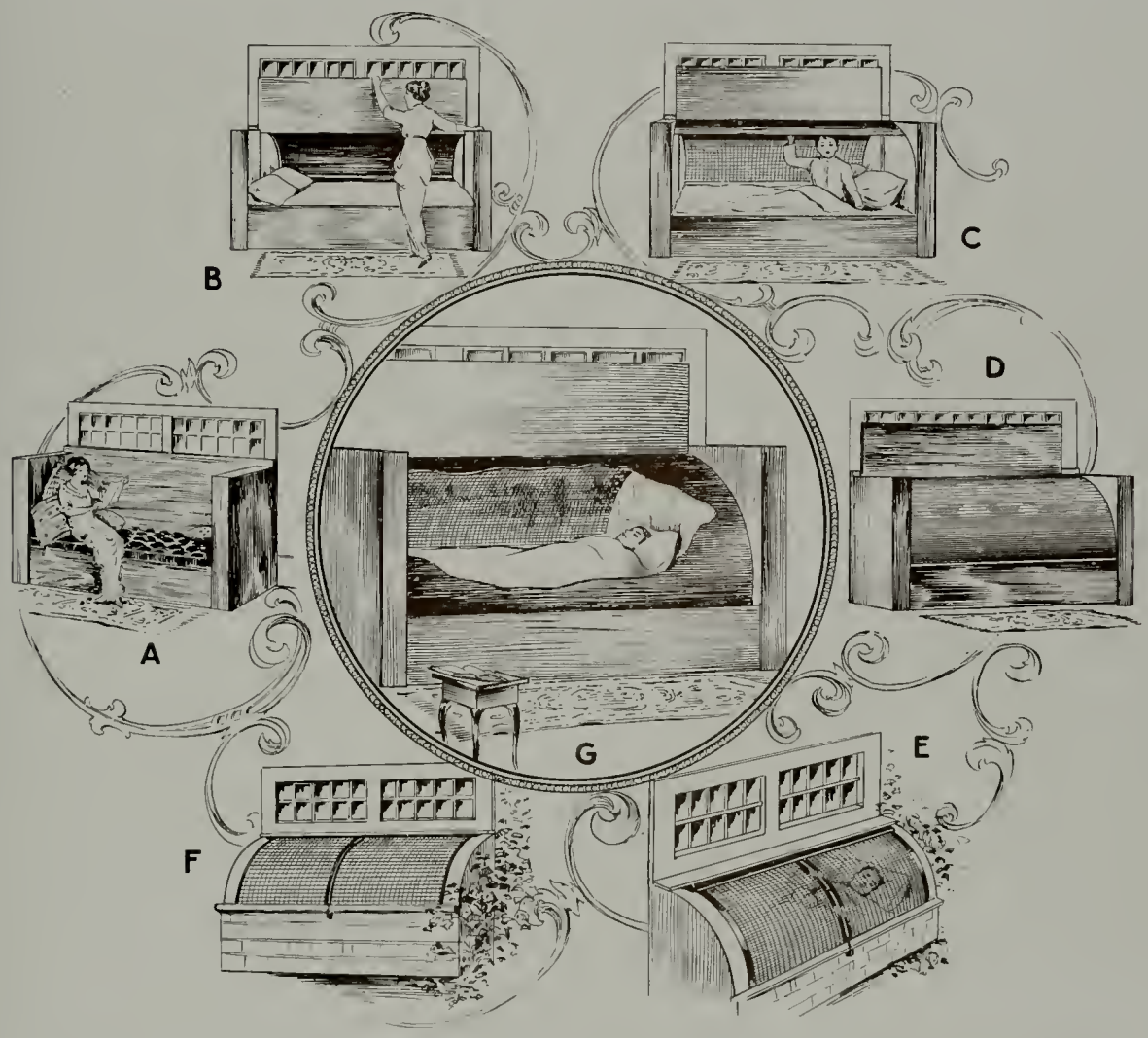

As you will observe from the above illustrations, about one-third of the CO-RAN FRESH AIR BED is concealed under the seat of a Davenport (A) in the room proper and the rest in an alcove-like addition extending **outside** about two and one-half feet (F). The dome-shaped wall of the alcove revolves, and by simply swinging it over to the inside (C) the occupant finds himself **out in the open**, protected by a heavy wire screen and adjustable storm curtain (E). By reversing the operation, the bed is really **inside again**—just as much so in fact, to all intents and purposes, as **any other article in the room**, thereby making it possible for one to retire in his room, sleep in the life-giving fresh air all night, and arise in the morning **again in the warmth and comfort of his own room.**

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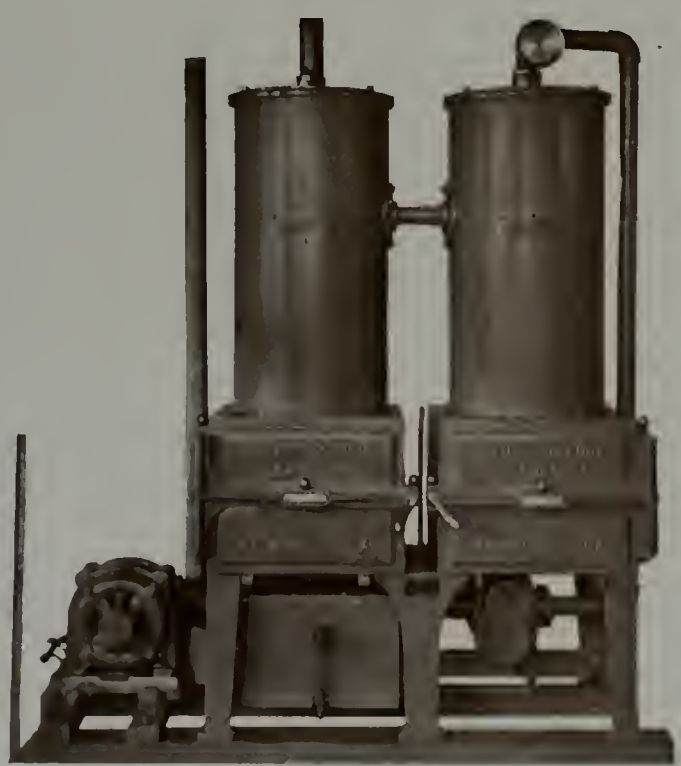

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The Pacific Coast Architect

VOLUME VII — SAN FRANCISCO, CALIFORNIA, APRIL, 1914 — NUMBER 2

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The Editor will be pleased to consider contributions of interest to the readers of this publication. When payment for same is desired this fact should be stated. Self addressed envelopes must accompany all such contributions.

ADVERTISING RATES ON APPLICATION — TEL. DOUGLAS 3424

EDITORIAL.

The National Architectural Exhibition

The San Francisco Architectural Club have completed arrangements and are now active in preparing for the National Architectural Exhibition to be held in San Francisco during the time of the Panama-Pacific International Exposition in 1915.

We will naturally expect the individual co-operation of every architect, particularly on the Pacific Coast in supplying the Exhibition with the best work he has produced so that it may be exhibited to the thousands who will be in San Francisco at that time.

It is their intention to issue a very elaborate Year Book in conjunction with the Exhibition and it will contain reproductions of the work on exhibition that is selected by the committees appointed in the various cities of the United States.

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P.-P. I. E. Co. Adopts Local Architect's Invention

The Butterfly Map invented by Architect B. J. S. Cahill, has been adopted by the Panama-Pacific International Exposition company to illustrate the "circumaviation" of the world to take place from San Francisco 1915. The map was chosen for this purpose because distances are correct on all parts of the map which preserves a uniform scale.

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Building Heights

New York, or more properly Manhattan, has nine buildings exceeding 400 feet in height as follows:

Woodworth Building	750 feet
Metropolitan Life Building	700 feet
Singer Manufacturing Company Building	612 feet
Municipal Building	560 feet
Bankers Trust Building	539 feet
New Equitable Building	485 feet
Adams Express Company Building	424 feet
Times Building	419 feet
West Street Building	404 feet

The American Academy in Rome

Officers, 1913

Wm. Rutherford Mead, Pres. — C. Grant LaFarge, Sec.
Theodore N. Ely, V.-Pres. — William A. Boring, Treas.

Executive Committee, 1913

Edwin H. Blashfield — Wm. Rutherford Mead (Ex Officio)
William A. Boring (Ex Officio) — H. Siddons Mowbray
James C. Edbert — John B. Pine
Theodore N. Ely (Ex Officio) — Edward K. Rand
Daniel C. French — Edward Robinson
William M. Kendall — Breck Trowbridge
C. Grant LaFarge (Ex Officio) — Andrew F. West

Trustees to Serve Until 1914

Frank Frost Abbott — William M. Kendall
Allison V. Armour — George B. McClellan
William A. Boring — Edward K. Rand
Frank Miles Day — Breck Trowbridge
Robert W. DeForest — H. Langford Warren

To Serve Until 1915

Edward D. Adams — H. Siddons Mowbray
Herbert Adams — Charles D. Norton
John W. Alexander — John B. Pine
Nicholas Murray Butler — Henry Walters
Francis W. Kelsey — Andrew F. West

To Serve Until 1916

Edwin H. Blashfield — Henry C. Frick
Jesse Benedict Carter — Cass Gilbert
James C. Egbert — C. Grant LaFarge
Theodore N. Ely — Wm. Rutherford Mead
Daniel C. French — Edward Robinson
Anson Phelp Stokes, Jr.

Finance Committee

Edward D. Adams — Henry Walters
Robert W. DeForest

Jesse Benedict Carter,
Director of the Academy and Director of the School of Classical Studies.

Gorham P. Stevens,
Director of the School of Fine Arts.

"The Pacific Coast Architect" takes pleasure in presenting to the attention of its readers the following facts concerning the American Academy in Rome.

The Academy, founded at the close of the Chicago World's Fair, in 1893, by D. H. Burnham, Charles F. McKim, Augustus St. Gaudens and John LaFarge, is now all but a United States Government School of Fine Arts in Rome.

Up to the present time it has been supported entirely by private subscription, and it is not expected that Congress will make any appropriation in its behalf. Yet, the academy has ten acres, within the walls of Rome,

in the most beautiful part of the city, with four important buildings—three of them historical—such as the Villa Savorelli, or as it was afterwards known, the Villa Aurelia, surrounded by a superb garden, a splendid new building opposite it, which, though simple, provides complete accommodations for sculptors, painters, architects, historians and such other men as may be admitted to the academy, and two small villas—the residences of the heads of the two schools—the School of Fine Arts and the School of Classical Studies.

The present running expenses of the academy are about $60,000 a year; ultimately they will be at least $70,000 per year, or more. The net income from subscriptions already made, and from endowments, is about $52,000 a year. There is, therefore, at the present time a deficit annually of about $20,000, which must be met by temporary subscriptions until permanent endowment funds have increased sufficiently to cover same.

Some of the greatest names in America are connected with the academy. The subscribers include not only the original founders from among the group of architects, painters and sculptors of the Chicago Exposition; grants from big universities like Harvard, Yale, Cornell, Columbia and Princeton, and an allowance from the Rockefeller Foundation, but subscriptions from J. Pierpont Morgan, W. K. Vanderbilt, Henry Walters, Henry C. Frick and others.

At the present time, Mr. William Rutherford Mead, of McKim, Mead & White, is the President of the academy.

For the purpose of making the academy national as far as possible, it is desired that subscriptions to the endowment fund be solicited in all parts of the United States. A group of San Francisco architects have been invited and have consented to serve as a committee for this purpose and several subscriptions have already been promised.

"The Pacific Coast Architect" sincerely trusts that any persons interested will communicate with it or with any of the members of this committee. The committee is comprised of the following well-known architects:

Willis Polk — George W. Kelham
John Galen Howard — Lewis P. Hobart
Louis C. Mullgardt

It is not to the credit of the United States that it has up to now permitted its students in the Fine Arts to rely entirely upon the generosity and liberality of the French government. France has freely permitted foreigners to attend her National Academy of Fine Arts. However, the Grand Prix de Rome of the Ecole des Beaux Arts is open only to citizens of France, and therefore American students are deprived of this privilege. The American Academy in Rome will give to American students the same opportunities for academical honors as the Grand Prix de Rome of the Ecole des Beaux Arts does to citizens of France.

America, today, stands in the presence of a great revival in the Fine Arts, equal to, if not excelling, any period in the history of art. This revival is expressing itself in various forms. It is to become even more intense as a result of the exposition in San Francisco. We possess all the prerequisites for this artistic revival. We have the genius in our people, strengthened by its mixed origin. We have the wealth and the resources. The question which presents itself to us, therefore, is a very practical one: it is not the problem of arousing an interest in art—it is rather a problem of controlling this interest when it comes to expression. It is not proposed that the American Academy in Rome will teach the dogmas of the Fine Arts, but it is believed that the sincere student, inspired to highest energy by the conditions that have grown up in this country, will find in the academy at Rome, the broad foundation in which the roots of all permanent art must find most nourishment.

An "American" Quantity System

We do not advocate the adoption in this country of the English system. We notice that some of our contemporaries unwittingly refer to the present movement in aid of better estimating and contract methods as the "English" quantity system, but this is scarcely correct, for the system advocated by the A. I. Q. S., may be found, in principle at least—that is, "payment according to measurement"—elsewhere. For example, in Germany, France, Australia, South Africa, Ireland, Scotland, etc. What we have always advocated, and very properly so, we think, is the adoption of a system of our own—an "American" system—and not an appropriation of the methods or ideas of others, and which is more or less prevalent nowadays, to say nothing of their unsuitability for a progressive nation such as ours.

The Cornell Civil Engineer, which is the official publication of the Association of Civil Engineers of Cornell University, says in a recent issue:

"It is, indeed good news to hear that a definite move has been made towards the establishment of quantity surveying in this country, as a means of encouraging better methods of estimating and dealing with bids. The operation is so simple, and yet so fair, and satisfactory, that it is surprising the system has not been adopted in this country. However, a start has been made in the right direction with the organization of the American Institute of Quantity Surveyors, which has headquarters in San Francisco."

The president of the San Francisco Chapter, A. I. A., Mr. George B. McDougall, has appointed a Chapter committee upon "quantity surveying." We have reason to believe that this committee will be glad to hear from similar committees in other Chapters, with a view of bringing about an intelligent interchange of views and information in regard to this up-to-date subject. By this or similar co-operation between the Chapters it will be possible to collect valuable practical data, such, for example, as will, when put together, assist the institute in taking intelligent and definite action. Certain contractors' organizations are now at work, so as to be prepared for such a possibility.

Architects Are Capitalists in France

It is unusual for a house, however small to be built in France, without the services of an architect, who not only draws the plans, but actually superintends the work. Usually it is he who orders the building material and assures himself that its quality is up to specifications and requirements. The contractor and his workmen perform their duties in conformity with the architect's orders, and the latter, who is usually a man of capital, advances the funds required in order that the contractor need not wait for payment until the building is completed. Moreover, the French law imposes on the architect a serious responsibility, since he, as well as the contractor, is responsible for all defects of construction during a period of ten years.

Proposed Standard Sizes of Catalogues

When one considers the multiplicity of sizes of catalogues in use today, the advantage of a standard size is at once demonstrated. A committee appointed by the Technical Publicity association to investigate and recommend standard sizes for catalogues, recently measured 927 catalogues and found 147 different sizes, ranging from 3 x 5 to 11 x 14¼ inches.

This matter has been under investigation by the committee of the Technical Publicity association for the past eighteen months, and its investigations have led to the recommendation of 6 x 9 and 8½ x 11 inches for standards for all purposes. Both of these sizes will cut to very good advantage with a minimum of waste from catalogue papers now carried in stock by paper manufacturers. Another advantage of the larger size is that catalogues of these dimensions can conveniently be filed with correspondence, as this size will very nicely fit standard filing cabinets.

For paper bound catalogues, the cover should be trimmed to the exact size of the inside pages. Deckel edges and overlapping edges make catalogues less convenient to handle, and should be discouraged.

For catalogues with stiff covers the inside pages should be trimmed to the sizes recommended, i. e., 6 x 9 and 8½ x 11 inches, with an overlap of ⅛ inch.

The committee also recommended 8 x 10½ inches for bulletins, and this size was accepted by the Technical Publicity association, at its meeting on October 9, 1913, because a large number of companies are now using a letterhead of this size and because bulletins frequently accompany letters and are filed with correspondence. This size is also one that has been recommended by the Master Car Builders' association as a standard for letter paper and specifications.

When binders are furnished for bulletins, the should be 8½ x 11 inches. In this way they will be uniform with the 8½ x 11-inch catalogue and can be filed with them.

While the 9 x 12-inch size has been recommended by the Technical Publicity association for technical and trade journals, it is not recommended as a standard for catalogues.

The report of the Technical Publicity association is the same in all re-pects as the report of similar committees appointed by the American Society of Mechanical Engineers and the American Institute of Architects, except that these committees recommended the 8½ x 11-inch size for both bulletins and catalogues.

It is to be hoped that all manufacturers will appreciate the importance of this subject and for the benefit of their customers and pro-spective customers will adopt these standards for all future catalogues and bulletins.

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A big redwood tree was recently cut by T. W. Hine of Humboldt county and the logs measured inside the bark and at the small end:

	Diameter.	Length.	Scale.
1st log	144 in.	16 ft.	16,688 bd. ft.
2d. log	144 in.	18 ft.	17,648 bd. ft.
3d. log.	132 in.	20 ft.	16,504 bd. ft.
4th. log	126 in.	16 ft.	12,042 bd. ft.
5th. log	126 in.	20 ft.	14,870 bd. ft.
6th. log	120 in.	20 ft.	13,668 bd. ft.
7th. log	108 in.	32 ft.	17,778 bd. ft.
8th. log	108 in.	32 ft.	17,778 bd. ft.
			126,976 bd. ft.

What Will the Canal Do?

So overshadowing have been the engineering and commercial aspects of the Panama canal, that little attention has been directed to its likely architectural and building effects. But the time of opening draws so near at hand that the latter effect is beginning to receive a greater consideration. Prognostications of city growth are liable to error, else everybody would prosper in the real estate business.

But it is being voiced and it is getting into print that some people look for the practical creation and rapid growth of a city, either at Panama or Colon, where great warehouses will be erected and where great freight cargoes will be unloaded and separated into various divisions according to destination.

It is reckoned that freight from San Francisco to Chicago through the Panama canal direct to Albany and there transshipped could be delivered $2 per ton less than by rail across the Rocky mountains. The lumber interests of the Pacific coast are preparing to invade the Atlantic coast with their products as soon as commerce via the canal is made possible, and from the Atlantic coast to extend the trade as far inland as the freight tariffs will permit.

There are various other cities that expect a wonderful stimulus to growth from the canal commerce, among them New Orleans. The centers where the greatest construction benefits will be received cannot be predicted. The tide of commerce will in a large manner decide it. In the growth of the American nation, it is doubtful if any one enterprise exerted so vast and beneficial effect as the construction of the Erie canal. Prior to its completion, Ohio pioneers lived in abject poverty and the future seemed hopeless. There was no adequate market for the farm products. The canal immediately gave them an outlet to the Atlantic coast and transformed the despondent pioneer into an active and ambitious citizen, so that villages and cities began to spring up throughout the west and to grow rapidly.

The present acute state of politics over Panama canal tolls gives some idea of the importance of the question economically. The decision may benefit or retard the growth of various commercial centers in the country. It needs only a slight modification sometimes to change the whole course of a river, whether the stream be commercial or merely hydrogen per-oxide, plus adulterants.

The one deduction that seems clear is that somewhere in the country construction work is to be largely benefited and improved by the completion and opening of the Panama canal.

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Direct Bidding

A little daylight is beginning to appear in the matter of eliminating the general contractor in certain lines of building construction, and bidding direct with the architects or owner. The master plumbers and steamfitters have advocated this and in some cities have attempted to sidestep the general contractor in placing their estimates with various degrees of success.

The American Institute of Architects in a recent convention in New Orleans, La., passed a resolution recommending their members to adopt the practice of direct letting of contracts for mechanical equipment, such as heating and ventilating apparatus, plumbing, and electrical work, instead of subletting such work through the general contractor.

The Legislature of Pennsylvania, one year ago, passed a law requiring separate bids for plumbing, heating, ventilating and electrical work on public buildings in the state. This law permitted the contractors for such work to bid direct with the proper authorities and not through the general contractor. In two or three instances the legality of this law has been questioned, but in such cases the courts have granted a permanent injunction and permitted the proper authorities in charge of the building to accept estimates from and award the contract direct to the one who was to perform the work.

May the day be hastened when the so-called subcontractors can submit their bids direct to the architect or owner and thus prevent the peddling of bids by general contractors.

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Painting Building Exteriors

The frame structure of wood had of necessity to be painted to preserve the material making up the building exterior. How soon such a construction left unpainted would deteriorate and become of unsightly appearance is a common knowledge. When we constructed of brick the need for a preservative as paint was found to be wanting.

Face brick for exteriors rather than need any aid for appearance would be practically ruined by paint. Terra cotta also resists the weather and as an ornamentation should be left as it comes on the work. Therefore either of the foregoing reasons for painting wood structures is obviated by the use of brick and terra cotta.

Concrete buildings have now come into use and against paint plays a prominent part in aiding this material in appearance and preservation. Look about at the concrete structures and note the great amount of painting required on them. Many such buildings are marked off and then painted to represent stone. Painting this material to relieve it of the natural porosity is now recognized as a preservative of the material.

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Out-door Sleeping for the Health

A great many years have passed since the subject of open air treatment, particularly out-door sleeping, has been discussed by the medical profession in general. That it is suggestive in itself, none can deny. It appeals both to the patient and the practitioner. The window frame appliance leaving the head only in the open air was in the front rank until recently a new and most convenient method of out-door sleeping came to our notice The Outdoor-Indoor Bed. This method does away with every inconvenience and rather improves the condition of the room.

Upon excessively hot night so depressing to the invalid, the heat of the house may be shut off at night and the heat of the outside be shut out in the day time.

About one third of this bed is concealed under the seat of a davenport in the room proper and the rest in an alcove like addition extending outside about two and one half feet The dome-shaped wall of the alcove revolves and by simply swinging it over to the inside, the occupant finds himself out in the open, protected by a heavy wire screen and adjustable storm curtain. By reversing the operation the bed is inside a warm room, and the patient is free to arise without any aid nor the fear of being chilled

San Diego Architects Offer City Services

San Diego has recently gained title to tidelands which in the opinion of many, particularly professional men, are capable of high development from a civic betterment standpoint. The San Diego Architectural Association has adopted the following resolution, addressed to the common council, offering its services free of charge to work out a scheme for the development of the tidelands which if adopted would beautify the harbor and enhance the public welfare both from a commercial and civic standpoint:

"In view of the unusual opportunities for good architectural as well as commercial development of the recently acquired tidelands of the city of San Diego, it is the sense of this association that the city council should refrain from granting any franchises or leases on the reclaimed tidelands, especially that portion lying north of Broadway, until serious and mature consideration is given to the future development of this land by a special harbor commission to be appointed by your honorable body and the final adoption of a permanent plan approved by this commission.

"It is further recommended that part of the duty of this commission should be to select a board of the most experienced and competent harbor engineers and architects to recommend and assist in the formation and carrying out of such plan.

"To this end, the San Diego Architectural Association tenders its services to act collectively or individually as may be desired by your honorable body. Said services to be rendered gratis, for the common good and the advancement and beautification of the harbor and city of San Diego."

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Efficiency in Electrical Construction in Buildings

By Charles T. Phillips, C. E.*

While the cost of the electrical construction in the average building may be only a small percentage of the total cost, it is usually the first item in which economy is practiced. As a result, about 90 percent of buildings have an inadequate electrical installation. At the same time, data gathered from a number of stores, office buildings, hotels, etc., show that of the electrical work which is installed, only from 34 percent to 62 percent of the capacity of the installation is used or required—an average of less than 50 percent. In the majority of these buildings, the tenant cannot use the numerous electrical devices which go to make up the equipment of a modern business institution. For example a certain large business house is using only 52 per cent of the installation as originally specified, yet this same firm was compelled to spend over two thousand dollars for additional work before they moved into a building which they were leasing, to bring this item up to a point where it would be adequate to their requirements, and these requirements were not unusual.

In addition to the saving that could have been made in the first cost, the owner is paying interest, insurance, maintenance and depreciation charges against an idle investment, which, in these days of close competition, efficiency methods and specializing, will not obtain results in keeping with modern progress. The tenant or owner is put to extra expense after the building is completed, and, in the majority of cases a large amount of work is done in a temporary manner by the janitor, which does not give good service, is unsightly and increases the fire risk. Practically every fire started by

*Written for The Pacific Coast Architect by Mr. Phillips, Pacific Building, San Francisco

electricity can be traced to improper work. These conditions could have been easily avoided by the proper designing and detailing of the work before the contract was let.

The argument may be brought up that it is well to allow a certain margin for unforeseen requirements that may arise, but, if the design is given thorough consideration when the plans are being prepared, these requirements can frequently be incorporated in the original design. It is true that after the contract is let and during construction, the owner or tenant may require certain changes or additions that may increase the connected load at certain points to such an extent that marked changes in the construction will have to be made. Even under this condition the ultimate cost will not be as great as if the original design had been ample to supply the subsequent requirements. Changes or additions are rarely ever such that even a generously designed installation will meet and the writer's experience has been that it is impossible to have the design meet these requirements.

The mode of procedure in designing a system of wiring for illumination should be as follows: Ascertain the purpose for which each portion of the building will be used, the color scheme, whether of light, medium or dark tones, the type of fixtures (whether efficiency in light distribution will predominate or will efficiency be secondary to an artistic design), type and kind of lamps that will be used, method of control, approximate rate for electric current and whether low first cost is of more importance than subsequent maintenance. The method usually followed is to design the installation by rule-of-thumb, making allowance for the least efficient conditions that could possibly be met, and, in a great many instances, the capacity is many times greater than would be required under the most unfavorable circumstances. There may be cases where the requirements of the tenant, the color scheme and other factors can not be determined before the electrical work is designed, but, for stores, office buildings and similar installations, the necessary information can usually be obtained beforehand.

A fallacy usually connected with electrical construction is that expensive work is good work. This is not necessarily true. The writer's experience has been that high first cost, as a rule, means complications that could just as well have been avoided, as the finished installation usually lacks in flexibility and adaptability to its purpose, all of which may have been attained in a simple design. Marble switchboards, with polished trimmings, expensive fittings and unnecessary details, which are frequently specified, do not contribute to the effectiveness of the finished job. The switchboard is generally in some obscure portion of the basement, consequently the expensive fittings and unnecessary apparatus are hidden from view and could just as well have been omitted, or less expensive material could have been used. A great many details which are frequently specified could just as well be left out. Expensive fittings are often called for when the rest of the installation is of the very cheapest construction. An instance where an expensive marble switchboard of two panels with polished copper trimmings was called for was in the specifications of a small, cheap class C building. The total apparatus required on this switchboard could have been installed satisfactorily on a slab of slate three or four feet feet square, or in a sheet iron box lined with asbestos.

While the contractor or manufacturer who furnishes apparatus may realize that the construction is unnecessarily expensive, it is of no particular object to him to raise objections, his aim being to make the sale as large as possible and to follow the line of least resistance during the progress of the work. Constractors can not be expected to assume the responsibility of a proper design or to protect the owner against improper work, nor can he be condemned for looking after his own interest first. When contracts are taken at starvation prices, in order to get them at all, it is little wonder, if, to save himself, the contractor has to skimp the work and to search the specifications for every loophole to avoid certain requirements that would add to the cost. The more chance there is for extras, the lower the contractor is willing to bid. Extras mean large profits and practically no risk.

The majority of specifications state that the voltage loss shall not exceed a certain quantity with all lights burning. Nothing is said, however, about loss on motor circuits. Very rarely will the voltage drop be sufficient to affect the lights to such an extent that it can be noticed with the eye, and while there are cases where this clause is of value, the load factor of the installation should be considered. A high voltage drop may exist on the motor feeders, amounting to a loss of very much more power than the loss on the lighting circuits, yet, to my knowledge, I have never seen the voltage drop mentioned in connection with the power. "Will power saved by minimumizing the voltage drop pay for the added cost?" is a question that can be solved only by knowing the cost of the additional construction and the rate paid for current. In an industrial establishment a careful consideration of this item may be quite a factor in economical operation.

The greatest mistakes in connection with specifications is that they are ambiguous and incomplete. They will frequently consist mainly of paraphrased portions of the National Electrical Code, with other phrases and sentences which are impossible to interpret. A tedious enumeration of the many tests that the work will have to pass before acceptance (these tests as a rule are never made) and lengthy schedules of outlets, switches, etc., could be omitted, much to the improvement of the specifications. Bulk in specifications is not desirable. Verbosity is a defect. It is confusing, not only in estimating, but in making the installation. The wiremen prefer to depend on the plans, and where mistakes in construction are made they can usually be attributed to an attempt to specify those items that should be shown on the plans. On most jobs of electrical construction there are many details which specifications should not undertake to work out. Detail drawings should be furnished if satisfactory results are expected.

A clause frequently inserted in specifications, to the effect that the work shall be finished and complete, with all details and apparatus necessary to fulfill all requirements, even those not specified or shown, is not legal and can not be enforced legally. If certain items necessary to complete the work are not shown or specified, court rulings do not hold the contractor responsible. Frequently there are glaring omissions in the specifications, and although the contractor may feel sure that same will be required, he can not, in justice to himself, include them in his estimate, knowing that if he did his chance of being the lowest bidder would be very remote.

Ignorance of electrical matters may lead one to suppose that the approval of the inspector is a guarantee of first-class construction. Neither the underwriters nor the local inspection bureaus maintained by municipalities require that the construction shall be any more than safe from fire. The results to the owner may be very disappointing, yet the work may conform to all rules and requirements of these inspection bureaus.

There are a number of time-honored customs in electrical construction that seem to hang on in spite of the march of progress. A number of these, while still permitted by the electrical "Code," are not required. In many instances these items are detrimental to good service in addition to the added cost.

Where certain apparatus or fittings "will be selected later," as frequently noted in specifications, the contractor is at a loss as to what to estimate on, especially where there is a wide difference in the prices of the various articles that will fill the requirements. Recently a set of specifications contained the above mentioned clause, and as there were 648 of one particular article needed, and quite a variety from which to select, costing from 10 to 60 cents each, the contractor naturally estimated the highest priced type, at the same time, trusting, that if he were the successful bidder, he could install the cheapest one. There are very few items in electrical construction that are not made by several manufacturers, and in the majority of cases there are a number, the price and quality of which are the same. Why should not a selection of several or of one only be specified? The contractor can estimate with intelligence and delays and superintending will be reduced.

Make specifications brief. Show as much detail as possible on the plans and it will be found that the work will cost less, the construction will be of higher grade, there will be less extras and the tendency of the contractor to take a chance will be eliminated.

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Orpheum Theatre, Salt Lake City, Utah

The new Orpheum theatre, situated on Second South, between Main and West Temple streets, is the very last word in the way of physical comforts that stage and theatre experts have been able to devise up to date was built at a cost of a quarter of a million dollars.

Mechanically speaking, it has a complete equipment for the purpose of facilitating the operations, both behind and in front of the curtain.

Architecturally the exterior in polychrome terra cotta and tapestry brick is highly characteristic of the purpose of the building, and its details and general character, more or less in the modern Italian renaissance, indicate very forcibly to the passing public that back of the store and office building there is situated a sumptuous home for the muses.

One enters the handsome lobby with its groined ceiling in Caen stone, supported on arches and double columns with handsome Tennessee bases, and the full marble tiled floor, unique display frames and other up-to-date accessories, and eventually arrives at the auditorium proper through the spacious foyer.

The details of the interior follow very closely the character of the exterior in style, and this interior is treated in a very broad and simple manner. The first thing that strikes one is the entire absence of pillars and posts.

There are over 2000 seats in the theatre, about 1200 of which are on the first floor, the balance being in the boxes and balcony. There is no gallery, that portion answering the description of a gallery being located at the rear of the balcony and is reached by separate stairways.

Broad marble staircases lead to and from this balcony, and in case of fire or panic there are thirty exits from the building, so it is impossible for any disaster to occur. These exits lead into alleys on the sides and behind the building—in other words, there are exits on all four sides. The building itself is constructed entirely of steel, concrete and brick, and is absolutely fireproof, there being nothing in it to burn but upholstery and draperies.

The stage portion is entirely cut off from the audience by walls with fire doors, and the proscenium arch is in an instant shut off by the dropping of the asbestos curtain.

Returning to the question of decorations, the happiest and most harmonious color scheme has been adopted by the architect who made special trips to Chicago and New York for the purpose of selecting his materials and colors for the draperies and walls. The general tonality is French gray and gold, the gold being subdued with French lacquers in blue and mulberry. The draperies are old gold Orsini velvet, which are themselves relieved by crushed mulberry and rose colored silk.

The lighting scheme is exceedingly happy and novel. The ceiling and domes are lighted by concealed lights backed by mirrored reflectors, and while the house is flooded with light it is soft and comfortable. The few chandeliers that have been used in spots, and the beautiful candelabras on the balcony boxes serve as jewels which give brilliancy to the general atmosphere of the house. Incidentally there are 3097 lamps utilized in the building and 500 outside.

The front of the balcony is given over to loges, of which there are twelve, the center one answering to the royal box, which is a feature in all large European theatres. Then come the six balcony boxes and underneath on the first floor are eight more, making in all twenty-five. In relation to these boxes it is to be noted that one obtains a complete vision of the stage, which hardly ever occurs in any theatre.

The new Orpheum is also notable for its modern mechanical appliances. One of the most prominent features of the house is the fact that the air will be washed and either heated or cooled, as the climatic conditions require. This is done automatically.

An innovation that will be appreciated is rooms, showers and baths. A spacious animal room, too, will prove a benefit to showmen with valuable performing animals from the tropical climes, which must be guarded from changes of temperature at all times. A big scene dock for the storing of scenery and a spacious "prop" room are both improvements over anything existing in any other theatre in this intermountain region.

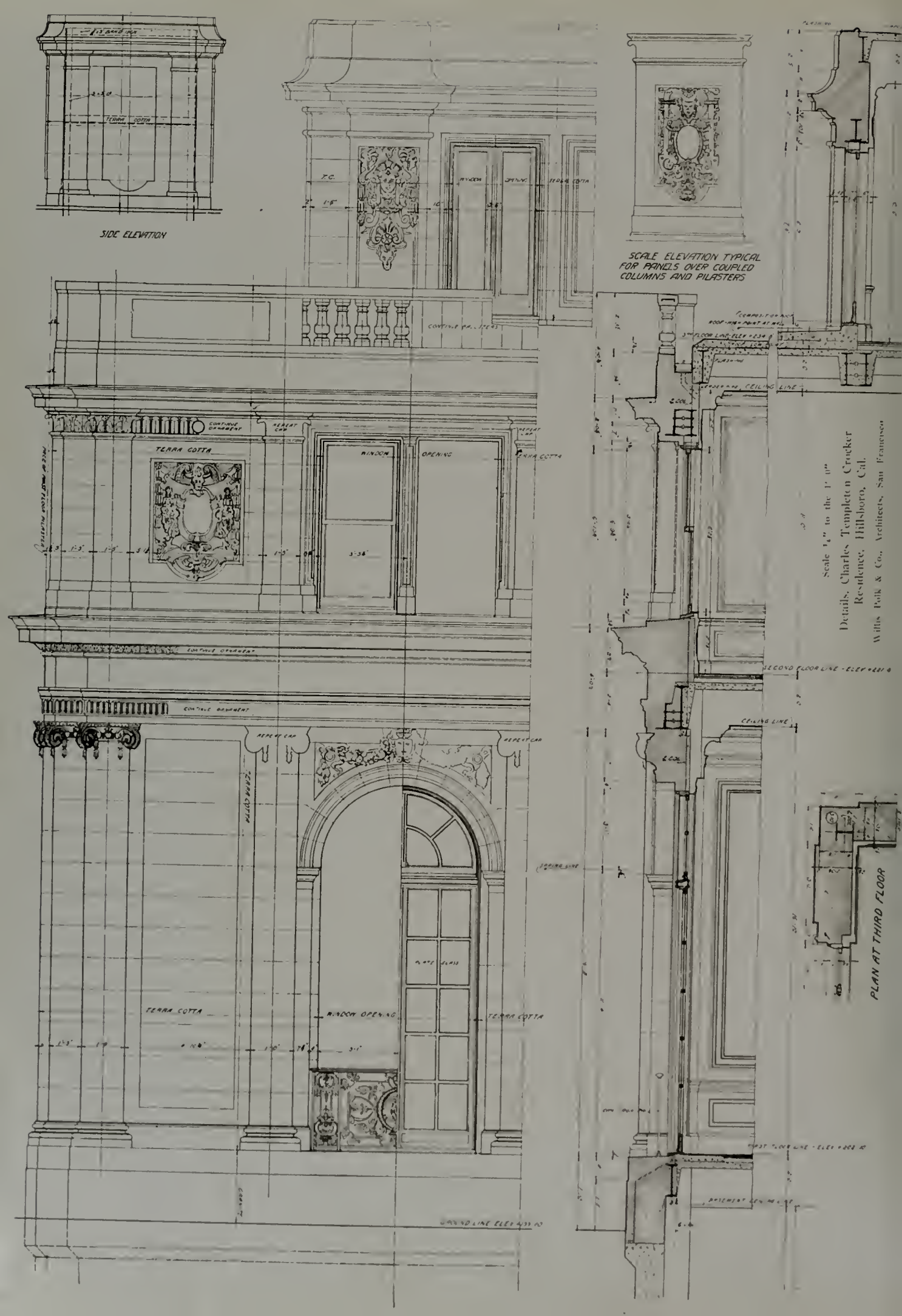
All features have been most carefully considered and executed and the general verdict of the professional theatrical man is that the stage side of the curtain is as complete and perfect as is the audience side. In other words, the old policy of fixing up the "front" to the neglect of the "back" is no longer in vogue in the modern theatre.

G. Albert Lansburgh, the architect of this complete theatre, has had previous experience in the wants of a modern vaudeville house, for both the palatial Orpheums at San Francisco and Los Angeles were built according to his plans and specifications and under his direction. Now that the Orpheum theatre here is completed, he has started upon a similar structure for the great vaudeville circuit in Kansas City. In addition he is supervising the erection of the Motor Transportation building, which will cover five acres at the Panama exposition and cost $40,000. Mr. Lansburgh is a graduate of the School of Fine Arts, Paris, and in 1906 he was awarded the gold medal at the Paris Salon given by the Society of French Artists.

—Photo by Gabriel Moulin

One Architect's Work in the Rebuilding of San Francisco

Every building shown in this picture is among some of the many representing the work of Willis Polk & Co. from April 18, 1906, to January 1, 1914


SIDE ELEVATION
SCALE ELEVATION TYPICAL FOR PANELS OVER COUPLED COLUMNS AND PILASTERS
TERRA COTTA
WINDOW OPENING
PLAN AT THIRD FLOOR
Scale 1/4" to the 1'-0"
Details, Charles Templeton Crocker Residence, Hillsboro, Cal.
Willis Polk & Co., Architects, San Francisco

Residence for Charles Templeton Crocker, Hillsboro, California
Willis Polk & Co., Architects, San Francisco

Photo by Gabriel Moulin

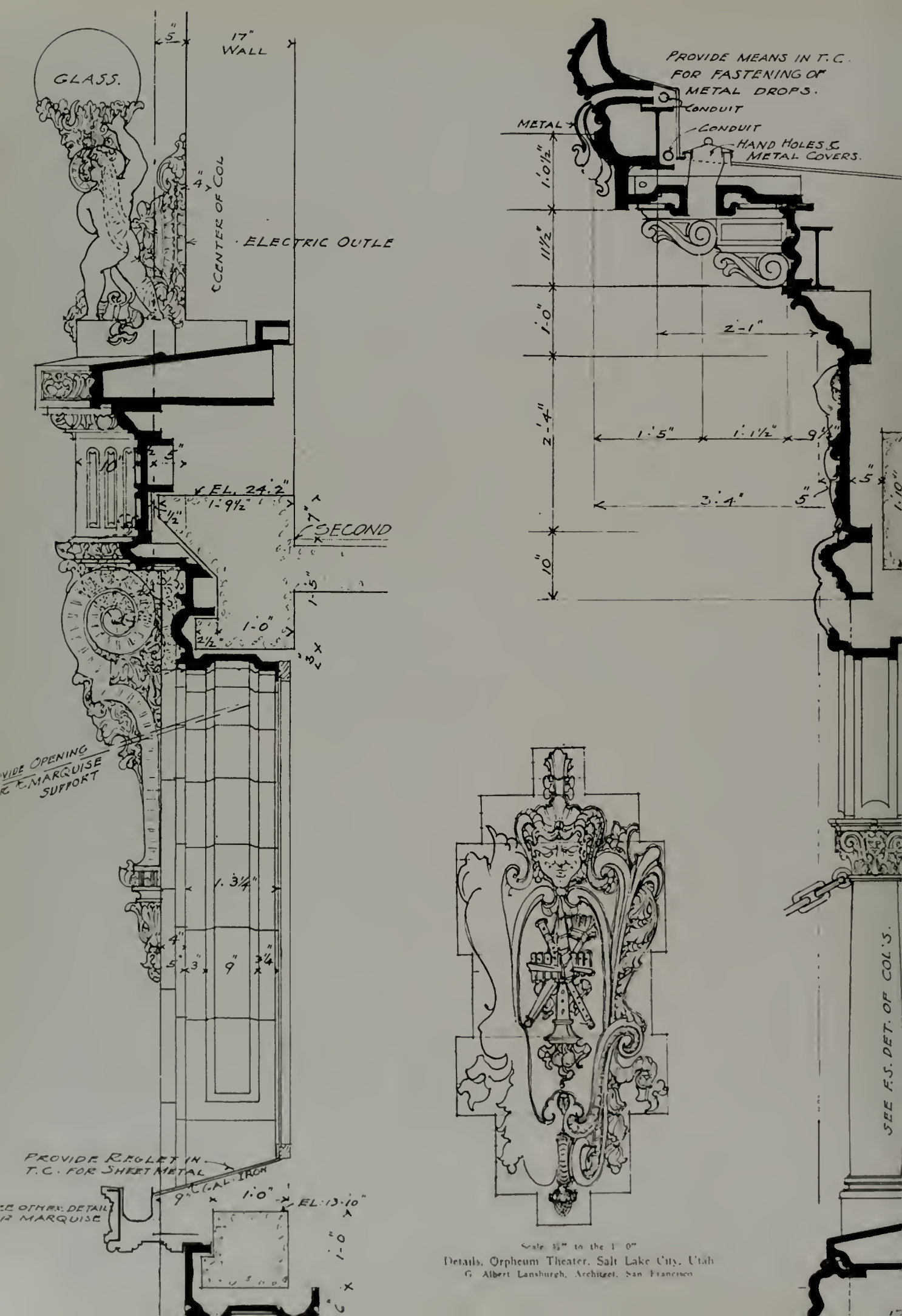
Residence of S. L. Naphtaly, San Francisco, California — Photo by Gabriel Moulin
Willis Polk & Co., Architects, San Francisco

Interior View of Drawing Room, S. L. Naphtaly Residence — Photo by Gabriel M[illegible]
Willis Polk & Co., Architects, San Francisco

Interior Court, S. L. Naphtaly Residence
Willis Polk & Co., Architects, San Francisco

Photo by Gabriel Moulin

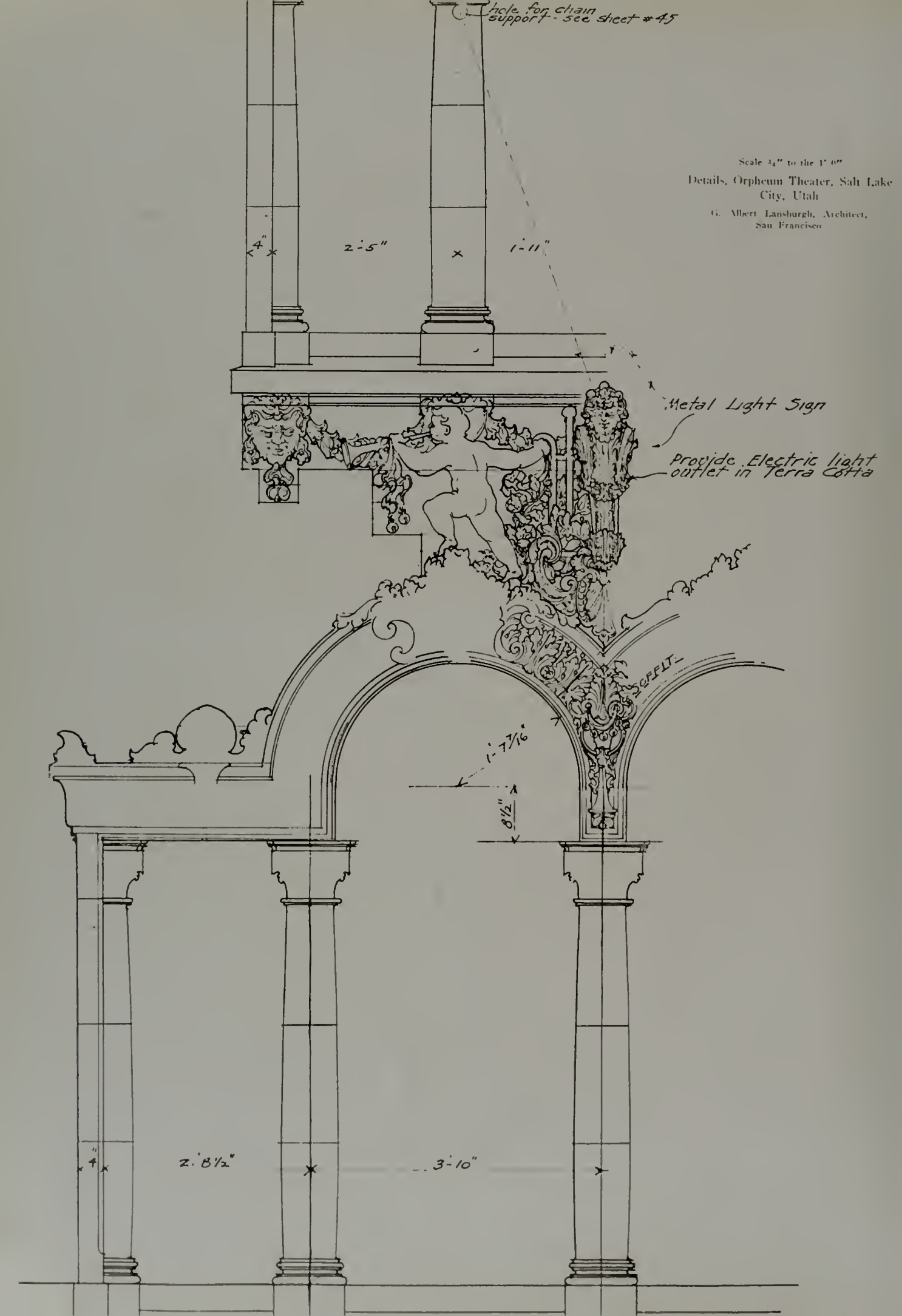
Exterior, Orpheum Theater, Salt Lake City, Utah
G. Albert Lansburgh, Architect, San Francisco



Scale ½" to the 1'-0"

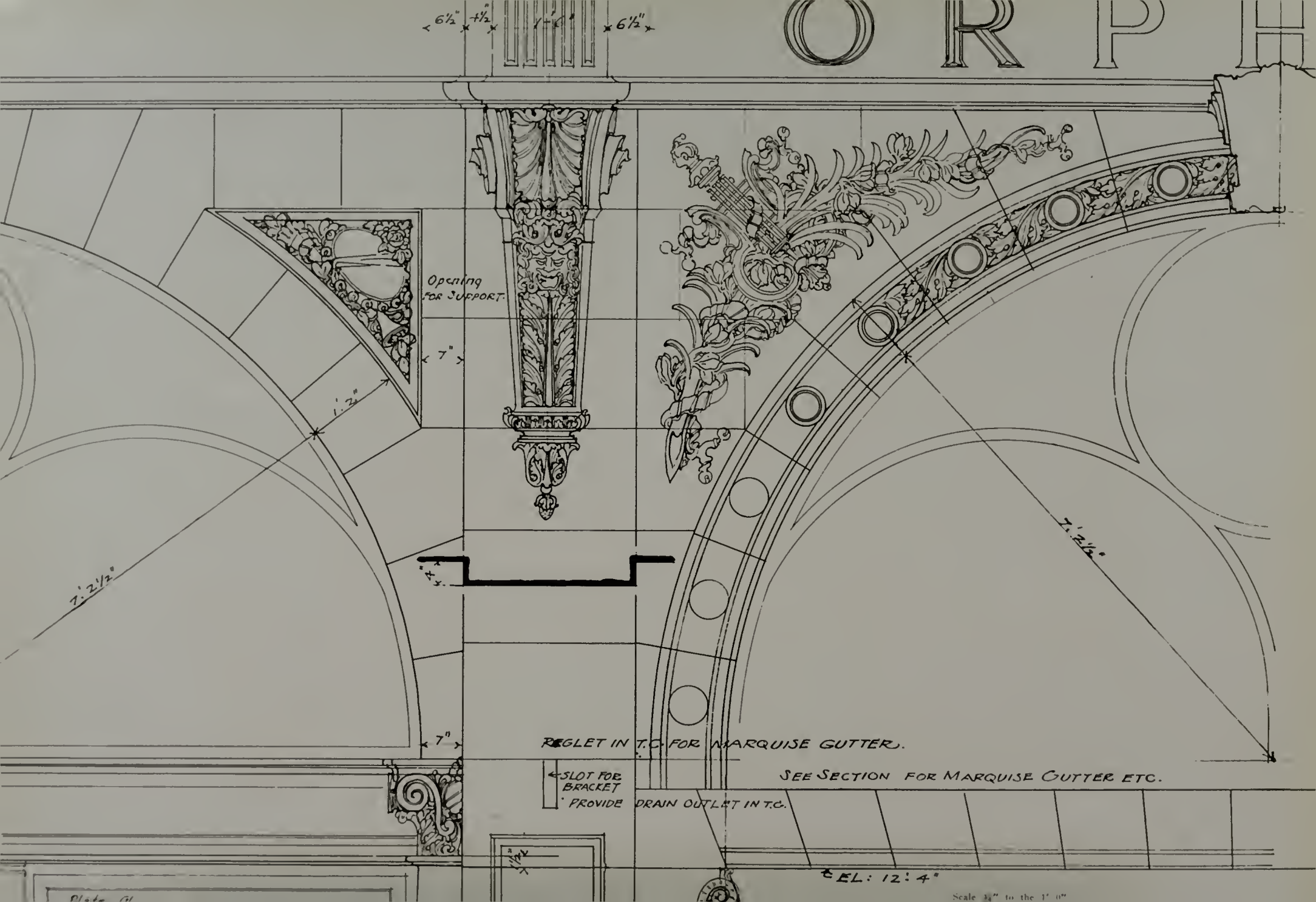
Details, Orpheum Theater, Salt Lake City, Utah
G. Albert Lansburgh, Architect, San Francisco

Proscenium Arch, Orpheum Theater
G. Albert Lansburgh, Architect, San Francisco


hole for chain support - see sheet #45
Scale 3/4" to the 1' 0"
Details, Orpheum Theater, Salt Lake City, Utah
G. Albert Lansburgh, Architect, San Francisco
4"
2'-5"
1'-11"
Metal Light Sign
Provide Electric light outlet in Terra Cotta
SOFFIT
1'-7 7/16"
8 1/2"
4"
2'-8 1/2"
3'-10"

View Showing Balcony, Orpheum Theater

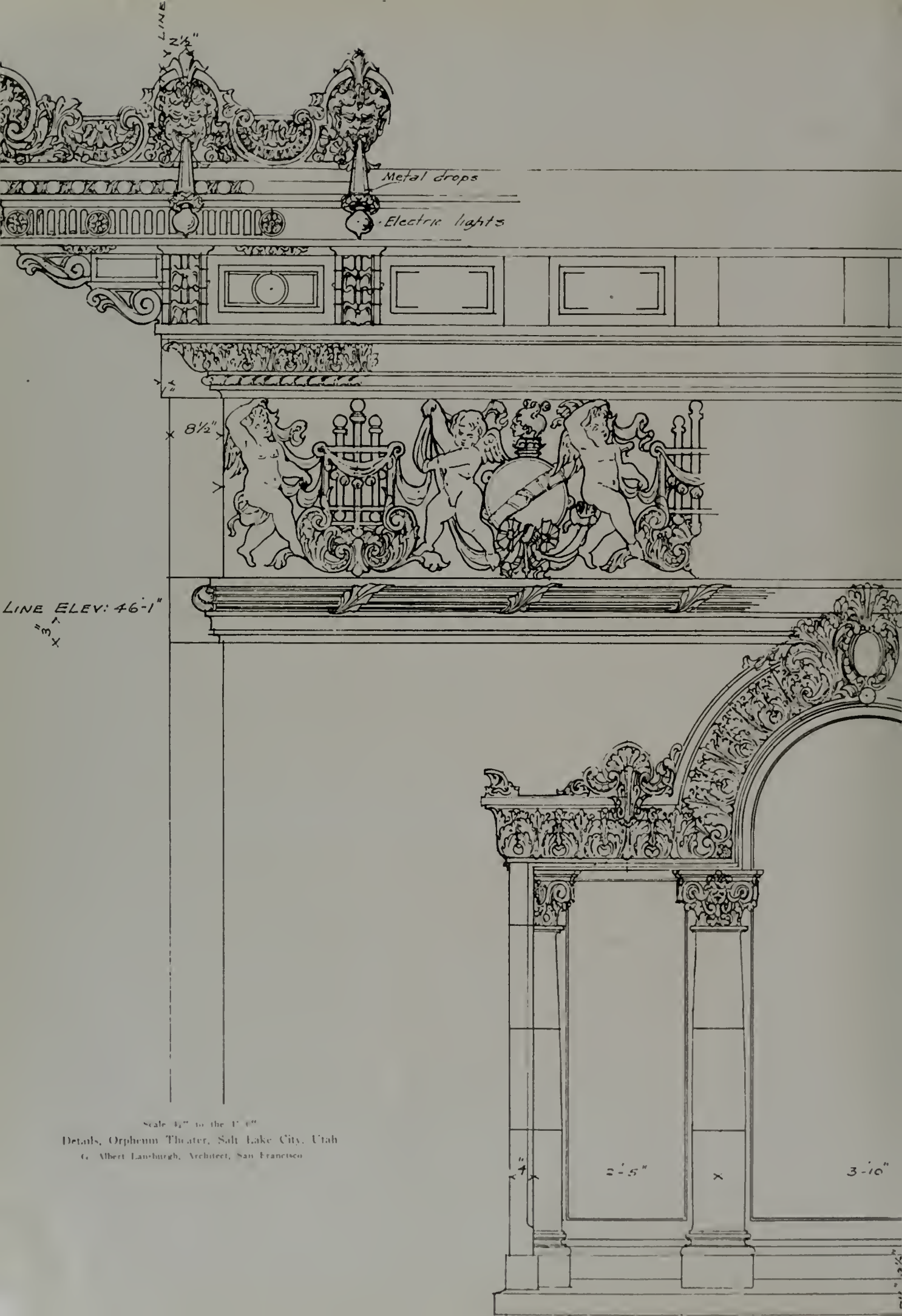
Lobby, Orpheum Theater
G. Albert Lansburgh, Architect, San Francisco


6½"
4½"
1'-1"
6½"
Opening for Support.
7"
1'-2"
7'-2½"
7'-2½"
7"
REGLET IN T.C. FOR MARQUISE GUTTER.
SLOT FOR BRACKET
PROVIDE DRAIN OUTLET IN T.C.
SEE SECTION FOR MARQUISE GUTTER ETC.
℄ EL: 12:4"
Scale ¾" to the 1'-0"

Detail of Lobby

View Showing Method of Concealed Lighting

G. Albert Lansburgh, Architect, San Francisco



Scale ½" to the 1'-0"

Details, Orpheum Theater, Salt Lake City, Utah

G. Albert Lansburgh, Architect, San Francisco

Lamp Standard, Exterior, Executed in Terra Cotta
Gladding, McBean & Co., Finn Frolich, Sculptor

Main Frieze, Exterior, Orpheum Theater
G. Albert Lansburgh, Architect, San Francisco

THE PACIFIC COAST ARCHITECT is the official organ of the San Francisco Chapter of the American Institute of Architects.

San Francisco Chapter, 1881—President, G. B. McDougall, Russ Building, San Francisco, Cal. Secretary, Sylvain Schnaittacher, First National Bank Building, San Francisco, Cal.
Chairman of Committee on Public Information, William Mooser, Nevada Bank Building.
Chairman of Committee on Competition, Geo. B. McDougall, 235 Montgomery St.
Date of Meetings, third Thursday of every month; annual, October.

THE AMERICAN INSTITUTE OF ARCHITECTS.
The Octagon, Washington, D. C.

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OTHER PACIFIC COAST CHAPTERS OF THE AMERICAN INSTITUTE OF ARCHITECTS.

Southern California Chapter, 1894—Vice-President, A. C. Martin, 430 Higgins Bldg., Los Angeles, Cal. Secretary, Fernand Parmentier, Byrne Building, Los Angeles, Cal.
Chairman of Committee on Information, W. C. Pennell, Wright & Callender Bldg., Los Angeles.
Date of Meetings, second Tuesday (except July and August), (Los Angeles).

Oregon Chapter, 1911—President, Morris H. Whitehouse, Wilcox Building, Portland, Ore.
Secretary, Ellis F. Lawrence, Chamber of Commerce Building, Portland, Ore.
Chairman of Committee on Public Information (not known).
Date of Meetings, third Thursday of every month, (Portland); annual, October.

Washington State Chapter, 1894—President, Charles H. Alden, 513 Colman Bldg., Seattle, Wash. Secretary, Arthur L. Loveless, 513 Colman Building, Seattle.
Chairman of Committee on Public Information, Chas. H. Alden, 513 Colman Bldg., Seattle (till further notice send all communications to Arthur L. Loveless, 513 Colman Building, Seattle.)
Date of Meetings, first Wednesday (except July, August and September), (at Seattle except one in spring at Tacoma); annual, November

Colorado Chapter, 1892—President, George H. Williamson, 528 Majestic Bldg., Denver, Colo. Secretary, Arthur A. Fisher, 450 Railway Exchange Building, Denver, Colo.
Chairman of Committee on Public Information, Arthur A. Fisher, 450 Railway Exchange Bldg., Denver, Colo.
Date of Meetings, first Monday of every month (Denver, Colo.); annual, September.

San Francisco Chapter, A. I. A.

The regular monthly meeting of the San Francisco Chapter of the American Institute of Architects was held at the Tait-Zinkand Cafe, on Thursday evening, March 19th, 1914. The meeting was called to order at 9:15 o'clock by Mr. Geo. B. McDougall.

There were twelve members present, and Messrs. Charles H. Alden and Thomas Morrin were present as guests of the Chapter.

MINUTES.

The minutes of the regular meeting of February 19, 1914, were read and approved.

STANDING COMMITTEES.

Reports were received from the following Standing Committees:

Building Laws Committee:

Mr. Mooser, for this Committee, reported that he had attended a meeting of the Board of Supervisors, at which certain building laws were being discussed. He stated that no other members of the Committee were present, and the Secretary was directed to ask the Clerk of the Board of Supervisors to notify the chairman of the Building Laws Committee whenever any matters of interest were to come up.

Educational Committee on Practice:

Mr. Smith O'Brien, for this Committee, said that it was mortifying to ask gentlemen to prepare papers for the Chapter meetings unless there was a larger attendance. He suggested that a strong notice be sent so that there would be an increased attendance at the next meeting, at which Mr. McCormack would read a paper on "Manufacturing of Ornamental Bronze and Iron Work." Under the auspices of this Committee, previous to the business meeting, Mr. Thomas Morrin read a most interesting paper on "Problems of Heating and Ventilating which Confront the Architect." A discussion followed the reading, and at the close Mr. Morrin was tendered the thanks of the Chapter.

Quantity Surveying Committee:

Mr. Wright, for this Committee, submitted a written report, which was ordered received and placed on file.

Committee on Relations with Building Trades:

Mr. Schulze, for this Committee, reported that there had been one meeting of this Committee with the Masons' and Builders' Association at which there had been some interesting discussions as to the plan which had been virtually decided upon by the Masons and Builders to notify the Architects that they would only figure on segregated contracts after the fifteenth of May.

SPECIAL COMMITTEES.

Committee on the Revision of the Constitution and By-Laws:

Mr. Mooser, for this Committee, reported that, at the request of the Institute, no further work had been done in regard to the revision of the Constitution and By-Laws. However, the amendment to the By-Laws, offered at the meeting of January 15, 1914, would be sent out for balloting.

COMMUNICATIONS.

The following communications were received and ordered placed on file:

Letter from Local Union, No. 509, of the United Association of Journeymen Plumbers, Gas Fitters, Steam Fitters and Steam Fitters' Helpers, stating that our communication to them, dated February 25th last, would be taken up by them at their regular meeting, held this month; from Mr. Chas. C. Moore, President of the Panama-Pacific International Exposition, requesting the co-operation of the S. F. Chapter, A. I. A., with the coming Exposition in 1915; announcement of the Fifth Annual Convention of the American Federation of Arts, to be held in Chicago; another request from the Portola Festival Committee for contribution to cover debt incurred during last Festival. Several communications from the Louisiana Chapter, A. I. A., relating to the proposed destroying of the army barracks at New Orleans; from C. H. Whitaker, in re the change of name of the San Francisco Chapter; from C. H. Whitaker, referring to the subscriptions to the Journal; from Mr. Swartout, Chairman of the Committee on Government Architecture, A. I. A., in reference to the establishment at Washington of a Department of Fine Arts; from Mr. Gilbert, copy of letter sent to Mr. Geo. M. Greenwood, President San Francisco Architectural Club, stating his approval in the matter of the above mentioned body holding a National Architectural Exhibition in San Francisco during 1915; and a copy of the Quantity Surveyor.

UNFINISHED BUSINESS.

There was no unfinished business.

NEW BUSINESS

The Chapter indorsed the action of the Louisiana Chapter, A. I. A., in protesting against the destruction of the buildings at the Jackson Barracks, and the Secretary was directed to so notify the Representatives of California in the United States Senate and Congress, and also the Louisiana Chapter.

The resolution of the San Francisco Chapter, directing the Secretary to collect one dollar from each Chapter member for the Institute Journal, was amended to include the Institute members.

In the matter of the City Planning Exhibit, it was duly moved, seconded and carried that the Chapter subscribe twenty five dollars towards the enterprise, and the Secretary to arrange with Mr. Cheney for a night to be devoted to the Architectural profession.

Mr. Charles H. Alden, President of the Washington State Chapter, addressed the meeting on the matter of closer relations between the Coast Chapters, and the desirability of fostering the work of the Architectural League. He also stated that he hoped there would be a large attendance at the next League Convention in Seattle.

The Chair having announced with regret, that the Southern California Chapter, A. I. A., had through death been deprived of its esteemed President, Robert B. Young, the Secretary was directed to express the sympathy and regret of the San Francisco Chapter to the Southern California Chapter for the loss it had sustained.

ADJOURNMENT.

The Chapter adjourned at 10:30 o'clock out of respect of the memory of the late Robert B. Young.

Subject to approval,

SYLVAIN SCHNAITTACHER,
Secretary.

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SOUTHERN CALIFORNIA CHAPTER, A. I. A.

The seventieth meeting of the Southern California Chapter of the American Institute of Architects was held at the Hollenbeck Cafe, Los Angeles, Calif., on Tuesday, March 10, 1914. The meeting was called to order at 7:35 p. m. by Vice-President A. C. Martin. The following members were present:

1.	John C. Austin	15.	O. W. Morgan
2.	J. J Mackus	16.	S. T. Norton
3.	F. P. Davis	17.	Robert H Orr
4	P. A. Eisen	18	Fernand Parmentier
5.	W. E. Erkes	19.	H. M Patterson
6.	P. H. Frohman	20.	W C Pennell
7	Homer W. Glidden	21	T F Power
8	Elmer Grey	22.	A. F. Rosenheim
9	John C. Hillman	23.	J. T. Vawter
10.	L. W. Krause	24.	Arg Wackerbarth
11	John P. Krempel	25.	Albert R Walker
12	A. C Martin	26.	H. F. Withey
13.	H. H. Martin	27	F R Schaefer
14	B M Morris	28.	Wm. Henry Willson

As guests of the Chapter were present: Mr. Herman Kenne and son, R. H Kenne, architects from Butte, Mont.; A W. Rea, architect; W E. Prine, and H. K. Hensley of the "Southwest Contractor"; John D. Bowler of the "Builder and Contractor."

The minutes of the sixty ninth meeting were read and approved.

For the committee appointed to confer with Master Builders, Mr T. A. Eisen presented a report. Mr. A. R. Walker next reported a meeting between the Chapter's Sub-Committee on Public Information and the Publicity Committee from the Los Angeles Builders Exchange. The Builders Exchange requested the Chapter's co operation for instituting better relations between architects and builders and establishing better methods in the practice of estimating, etc

After discussion it was decided to recognize the request of the Builders Exchange and to co-operate with them and the Secretary was instructed to communicate to the Exchange the Chapter's vote of confidence, on motion by John C Austin, seconded by Elmer Grey and duly carried

A F Rosenheim, on behalf of the Chapter's Sub Committee on Competitions, next called for a reading of recent correspondence between this Chapter and the regents of the University of Arizona, with reference to a competition for plans for an Agricultural building Following the reading of the several letters by the Secretary, A F Rosenheim read a letter from J. E. Allison to the University of Arizona A discussion followed concerning the proper form for the Chapter to adopt in issuing circulars to its members with reference to competitions Fernand Parmentier moved, seconded by Arg Wackerbarth, that the sub committee on Competition draft a form to be used An amendment by John C Austin was submitted to this motion, seconded by John P Krempel, that the committee prepare special circulars for each individual competition, same to be distributed to the members by the Secretary The amendment was carried

A F Rosenheim next presented a proposition from Mr George A Damon of Throop Institute of Pasadena, requesting this Chapter's patronage in instituting a competition for plans showing improvement of property at four corners of two intersecting streets in Pasadena After considerable discussion it was concluded that the matter should be referred to the Chapter's Sub-Committee on Education, on motion made by Fernand Parmentier, seconded by Homer Glidden and duly carried The Secretary was also instructed to communicate the Chapter's vote of thanks to Mr Damon for his public spirited attitude in this matter, on motion made, seconded and carried.

At the call of Mr. John C Austin the question of standard specifications as submitted sometime ago by the Master Painters association of Los Angeles to this Chapter was taken up. The original committee from this Chapter composed of A F. Rosenheim, H. F. Withey, T A Eisen and John C Austin presented a report which was read by Mr. John C Austin together with a communication from the Master Painters association, requesting the Chapter's adoption of their standard specification. A general discussion followed, after which it was decided to have a number of copies of the specifications printed and distributed among the Chapter members for their report at the following meeting, on motion made, seconded and duly carried.

For the Committee on Entertainment Mr. John P Krempel next reported that Mr. Meyer Lissner would deliver an illustrated lecture on his recent European trip at the following Chapter meeting.

The resolution of condolence on the death of William Curlett, drafted by the committee appointed by this Chapter, was next read by the Secretary. On motion made, seconded and duly carried, the resolution was adopted and ordered spread upon the minutes.

Elmer Grey next reported for the Chapter's Committee on Civic Improvements, composed of John C. Austin, Elmer Grey and A F. Rosenheim. He reported a meeting with a committee from the Municipal League of Los Angeles. The joint committee is to interest itself in the coming exhibit on city planning to be held in Los Angeles and to solicit from the Los Angeles City Council and the Los Angeles County Supervisors financial assistance towards this end. A resolution to this effect has been prepared by the committee to be submitted to these bodies.

A. F Rosenheim next read a reply to his letter from Frank Miles Day with reference to an address delivered by the latter some time ago on civic improvements. The letter advised that the lantern slides used in his lecture would be available for this Chapter for similar use.

With reference to the location of the proposed City Hall for Los Angeles, the committee advised the Temple block site on condition that certain adjoining property be secured for a general civic centre plan, and the committee further decided that the plan developed by Charles Mulford Robinson for a civic centre for Los Angeles some years ago, would not be practicable or applicable today, and they proposed to recommend to the City Council the employment of the best city planning expert available; the committee contemplating a resolution to that effect to be submitted to the City Council. A general discussion followed and the committee was instructed to act with the planning commission of the City of Los Angeles, on motion made by John C Austin, seconded by Aug. Wackerbarth and duly carried.

Communications were next read as follows. From Mrs R. B. Young, acknowledging the Chapter's resolutions of condolence in the recent death of Mr. R. B Young, president of this Chapter. From Octavius Morgan, member of this Chapter, at present traveling in Europe, his greetings to the Chapter members. From the Municipal League of Los Angeles acknowledging the committee appointed by this Chapter to co operate with the league in city planning and civic improvements.

From C. H Whitaker in answer to a letter from this Chapter of February 11th, with reference to the proper course of procedure for the election of a new president.

From W R B Wilcox, from Seattle, a director of the Institute, acknowledging receipt of the report of the Fourth Annual Institute Convention from the delegates of this Chapter.

From Egerton Swartout, chairman of the Committee on Government Architecture, A. I. A., requesting this Chapter not to take active steps temporarily in matters pertaining to Government architecture.

From Horace Welles Sellers, secretary of the Philadelphia Chapter of A. I. A., requesting this Chapter's action through the Senators and Congressmen of this district in preventing the proposed demolition of the Jackson Barracks at New Orleans On motion, made by John P Krempel, seconded by John C Austin, and duly carried, the Secretary was instructed to communicate with the proper authorities in Washington in order to carry out the request of Mr Horace Welles Sellers

Mr John T Vawter, a member of this Chapter, read an interesting paper on Architectural Accoustics, illustrated by diagrams and sketches on a blackboard A general discussion and questioning of the speaker followed the reading of the paper, after which, on motion made by John P Krempel, seconded by A F Rosenheim, a rising vote of thanks from the Chapter was tendered to Mr John T Vawter.

The meeting adjourned at 11:25 p. m.

OREGON CHAPTER, A. I. A.

The meeting was called to order February 14, 1914 at 12:30 by President Whitehouse

In the absence of the Secretary, Mr Johnson was appointed to serve as temporary secretary

The following members answered the roll call: Messrs. Wilson, Williams, Smith, Beckwith, Mayer, Jacobberger, Naramore, Emil Schacht, Chester Hogue, Johnson, temporary secretary, and Whitehouse.

Motion made by Mr. Wilson, seconded by Mr. Hogue, carried approving minutes of last regular meeting. Minutes of the last executive meeting were read and approved.

REPORT OF STANDING COMMITTEES.

Committee on Legislation reported.

Motion made by Mr. Wilson, seconded by Mr. Hogue, that Mr. Fouilhoux call special meeting of Building Ordinance Committee to discuss the matter of certificates by the Building Department for final completion of work.

Committee on Building Laws—No report.

Committee on Membership—Mr. Wilson spoke his disapproval of approaching prospective members to the Chapter without first having the Chapter ballot on their names. Without further discussion such action on the part of Mr. Wilson was approved.

Committee on Competition—No report.

Committee on Municipal Plans and Affairs—No report.

Committee on Education—No report.

Committee on Programme and Entertainment—No report.

Committee on Quantity Survey reported that the engineering societies and architectural societies had endorsed the Quantity Survey system, and that the committee is now awaiting the attitude of the Builders Exchange.

Committee on Rose Festival reports as follows:

"Your committee, appointed to co-operate with the regular Rose Festival Committee, begs to report that, after several discussions as to the most advantageous scheme of street decoration and the streets to be considered in the scheme, the several members of the committee have been able to work upon a common plan and have prepared sketches showing their ideas. These ideas have been further boiled down and will be presented to your committee at its next meeting."

Committee on Publicity—no report.

BALLOTING.

Ballot on Revised Schedule of Charges carried 19 to 2.

Letters were read from Messrs J. H. Rankin and Knickerbacker Boyd; and a letter from Mrs. King relative to School House Decoration. In Mrs. King's letter it was asked that the Chapter appoint a representative to meet with her committee for the purpose of discussing the best means of beautifying the school rooms and grounds. Mr. Lawrence was unanimously elected representative and the Secretary was instructed to reply accordingly to Mrs. King's letter.

Letter from Mr. Sturgis regarding the "Octagon," which letter was laid on the table awaiting further communications on this subject.

Mr. Jacobberger submitted several schemes for the location of the Auditorium on the West Side as follows:

"The question of the location of the proposed Auditorium is now a most interesting one before the people of Portland. I believe it will be conceded that the location should be on the West Side and should be situated to fit in with the civic improvement as contemplated in the Bennett Plan. The question of finance has evidently been the stumbling block before the different commissions and City officers. Would like to offer the following as a possible solution of the problem:

The ideal arrangement would be the acquiring of the double block bounded by 10th, 11th, Jefferson and Main street, leaving the present Ladd School for a future Art Building, the present Ladd & Corbett Block for a Museum, etc., widening Madison street to 120 feet, so as to permit the greatest possible frontage of the Auditorium through this widened avenue to the Park Blocks. This, on account of the expense, may be impossible. The next arrangement would be the exchange of the Ladd School block for the Market block, transferring the Ladd School to the present Old High School Building on 14th and Morrison. This would serve the school population of that district almost as conveniently as the present one. The School Board then to erect on the Market Block the Trade School, Supply and Storage Building for the School District. This, to my mind, would be a splendid situation for such a building, as I understand that probably only one Trade School would be required by the city for considerably greater population than it now has.

This done, the Ladd School block would be available for the Auditorium by an exchange of properties between the two public bodies. This location, I contend, will comply with every demand that can be made. As to fitting in with the civic plan, its nearness to the business and hotel centers and its transportation facilities, even now not excelled by any other site, as can readily be seen by reference to the plan of this location.

If it is deemed necessary to have more than the one block, the block west should be secured and cross street vacated. This would give a site of 200x480, 200 feet front on the Park block, giving plenty of room for circulation around building.

As I understand it, there is some money available for the purchase of additional ground; if the amount is insufficient, take enough out of the building appropriation and then go as far as you can with building, which would be sufficient at least to complete greater portion, leaving certain portions incomplete, but would give the use for the main intention of such structure until further appropriation can be secured, which I feel confident the public will give in due time on account of the proper location of the building.

The fact that the plans are already completed and which have involved an expense of several thousand dollars, which would be lost in case a smaller site was adopted or by other sites that conditions might require total new drawings, should have much consideration. The present Architects could revise their drawings to suit the grades of this site, otherwise no change would be necessary and would mean expediting the progress of the work. Should the one block be deemed sufficient, the city could appropriate say 40 feet of the 70 or 80 feet of 10th street, and the fact that frontage is on the Park blocks, the entire space of 200x240 would be available for building, since it would be unnecessary to leave any space in front for circulation, which would be necessary in any other unparked location.

It would seem to me that at least one of these schemes is practical, and therefore would ask the chapter to consider these suggestions, and if deemed feasible, to put forth such efforts as lay within the powers of the body to bring to a fruition at least one of these suggestions."

It was moved and carried that the Chapter express to the City Commission its unanimous approval of a West Side site. Mr. Whitehouse volunteered to see Mr. Brewster in regard to the several possible sites as provided for in the drawings of Mr. Jacobberger.

There being no further business, the meeting adjourned.

WASHINGTON STATE CHAPTER, A. I. A.

The Chapter met at dinner at the Seattle Athletic club at 6:30, March 14th, 1914, with the following members present:

Behb	Somervell
Blair	Thomas
Cote	Willatzen
Gould	Willcox
Loveless	Field
Myers	Ziegler
Schack	

Owing to the absence from the city of President Alden and the illness of Vice-President Everett, Mr. Gould was elected temporary chairman for the evening.

The minutes of the previous meeting were read and approved.

The Secretary's report was presented, which included, among other things, the whereabouts of several members of the Chapter, an invitation from the Pacific Northwest Society of Engineers to be present at their March meeting, an announcement from the Institute that subscriptions would shortly be called for for the purpose of extending and repairing the Octagon. Attention was called to the weekly Thursday luncheons and all members were urged to make an effort to attend them as often as possible.

The Treasurer's report was read and ordered placed on file.

At the suggestion of the chairman, Mr. Willcox made a few brief remarks concerning architectural impressions on his recent trip East. He called attention to the fact that Seattle has no such architectural opportunity as is afforded by Michigan avenue in Chicago and the streets in several other Eastern cities of similar nature.

The chairman introduced Mr. E. R. Erskine, who presented to the Chapter his view of the work of architects in Seattle and certain possible extensions of their field along usefulness, suggesting among other things, that they take up the matter of constructing as well as designing of buildings. He suggested that buildings should be so designed that they would not "go out of style," and called attention to the lightness of the structure coupled with heaviness of ornament, which he observed in a good many buildings which had come under his notice, the type usually designed by contractors and others not trained in the principles of design.

Mr. A. B. Lord, who was also present as a guest, gave some ideas as to the laying out and developing of certain city districts surrounding prominent buildings.

An interesting discussion followed these two addresses, especially along the lines suggested by Mr. Erskine that architects were entirely too modest and should advertise in some form or other much more than they did at present.

The meeting adjourned at 10.05 p. m.

COLORADO CHAPTER, A. I. A.

There being no news of interest as the matters of the last meeting, March 2nd, 1914, were entirely of a local nature, therefor they have included the following article:

EXAMINERS OF ARCHITECTS.

The Colorado State Board of Examiners of Architects has issued its first printed report, a pamphlet of 36 pages, containing in details the organization of the board, the law under which it acts, the rules adopted, list of architects licensed, etc. The report says:

The following states have licensing or registration laws in force to control the practice of Architecture: California, Colorado, Illinois, Louisiana, New Jersey and Utah. Licensing laws are being considered in Indiana, Missouri, New York, Ohio, Texas and Washington state.

The latest reports from other state boards of architects where the licensing laws are in force, show most salutary results. Any person in either of these states who has not a license finds that he is handicapped without same, as the general public now comprehends distinctly the meaning attached to the issuance of a certificate of license.

It has been determined in numerous instances that on account of the provisions of the Licensing laws, controlling the practice of Architecture, a person without a license as required by law, cannot recover anything from his client for services rendered, and that any contract for the payment of such services is void.

The licensing or registration of architects has naturally increased the standard of architectural education, by the substitution of a compulsory system of qualifications, instead of the old voluntary system wherein there was no possible or adequate protection to the public from unsafe construction and unsanitary buildings.

SAN FRANCISCO ARCHITECTURAL CLUB.

The club has recently offered prizes to the Atelier Students in the sum of $5.00 for the best Order Problem, $7.50 for the best Class B Plan Problem, and $10.00 for the best Class A Problem. There are five problems during the year in each of these classes. This is intended to stimulate interest in the Atelier work and will tend to bring in new members.

The Atelier season extends well into June and at the close there will be formed classes in Life Drawing, Water Color and Clay Modeling.

A class in Structural Engineering is now being formed under the direction of a member of the faculty of the Department of Civil Engineering, University of California. This class in the past has been very popular and some very good work has been done by its members.

Word has just been received by the club of the success of one of its members, Mr. Edward L. Frick, in his entrance examinations to the Ecole de Beaux Arts in Paris.

In the examination in architectural design he was given a mark of 17 out of 20. This was the highest mark given out of 700 applicants of the school in this examination in five years.

Mr. Frick received his training in the club Atlier, and last year won a scholarship of $1,000 offered by the Architectural League of the Pacific Coast.

Another member, Mr. Ernest Weibe, has been placed fifth in the first preliminary for the Paris prize among all the students in the United States. He has also submitted a very fine problem in the second preliminary, and it is hoped by his friends that he may be selected as one of the five to compete in the final competition, which gives $250 per quarter for two and a half years study in Paris.

This is the largest prize offered in the United States.

The Proceedings of the 47th Annual Convention

Report of Committee on Public Information for the Forty-seventh Annual Convention of American Institute of Architects.

Mr. President and Members of the Board of Directors,
American Institute of Architects.

Gentlemen:

Immediately upon the close of the last Convention a list of the newly elected officers, members of the Board, and Fellows, together with a copy of President Cook's Annual Address, was forwarded to the principal newspapers of the country. A letter was enclosed to the papers in cities wherein those officers or Fellows were resident, calling attention to the honor conferred upon one or more of their citizens, and, in the case of Fellows, stating what that distinction meant. A letter was sent to the editor of each professional, technical or other publication in the country believed to be interested in the Institute's deliberations, with a list of all principal committee reports presented at the Convention, offering to send, upon request, a copy of any report.

The result was, in each case, that the accounts given of the Convention and the reports printed were numerous and accurate. Not only was the public more fully informed than ever about the transactions of the Institute, but it was surely a source of gratification to members thus honored by their professional associates to find, upon their return from the Convention, this distinction chronicled as an event of interest to their fellow townsmen.

Members and others who attended the last Convention will remember the forceful address delivered by Franklin H. Wentworth, Secretary of the National Fire Protection Association, in which he made a convincing appeal for the co-operation of the Institute in the work for which his Association stands. Very shortly after that occasion the Chairman of this Committee, after conference with Mr. Wentworth and with the officers of the Institute and of eighteen Chapters, arranged for a speaking tour by Mr. Wentworth, under the auspices of the Institute, before those Chapters which he could reach in a month's travel.

Even after the itinerary was completed such interest was manifested in the spreading of the Fire Prevention Propaganda that additional Chapters were placed on the list, as well as State Architectural Associations (not integral units of the Institute) in some of the States through which Mr. Wentworth would pass. In two of these States Chapters of the Institute have since been formed.

Announcement of the Chapters and Associations visited, with a brief report of his tour, will be made by Mr. Wentworth himself, he having accepted an invitation to come to this Convention for that purpose.

While the tour was arranged under the auspices of the Institute, through its Committees on Public Information in various parts of the country, to better inform the public on matters pertaining to sound building construction and the prevention of fire, too much credit cannot be given to Mr. Wentworth and his Association, but particularly to himself personally for his willingness to undertake the arduous task of such an extended tour.

The American Institute of Architects, through its Chapters, in thus bringing the public in general and architects and professional men in particular to a realization of what can be done by all of them in lessening the fire risk and in aiding in the conservation of human life and property, placed itself before the country as a public spirited body of men quite as much interested in the community welfare as in the advancement in other directions of the profession which it represents. The educational value, also, of the discussions and of the matters concerning the various meetings which appeared in the press is a factor not to be lost sight of.

It would appear significant that, shortly after his tour, at the Annual Convention of the National Fire Protection Association, an Architect, a member of the Institute and President of of its largest Chapter, was elected President of the National Fire Protection Association, and that the Association created a National Committee on Public Information with sub-committees in all principal territories, modelled upon the lines of that in our In-

stitute. At the same Convention the Chairman of our Committee was privileged to address the members on "Co-operation in Public Information."

The Committee with its chain of sub-committees distributed to the principal newspapers of the country and to about one hundred magazines a number of documents received through the Secretary, Glenn Brown, and reprints of an article from The Journal, all relating to a Lincoln Memorial Monument and opposing a roadway.

The Chairman of the sub-committee in the Indiana Chapter performed yeoman's service in the matter of the competition for the Indianapolis Centennial Building and issued a carefully prepared exposition of the Institute's attitude toward this and competitions in general, which appeared in the local papers. This and a statement by the Chairman of the Institute Committee on Competitions were given wide distribution by our Committee.

There have been distributed from one Chapter to another, and at times to all Chapters, various documents likely to be mutually helpful, such as the joint report of the Boston Society and the Master Builders' Association, new schedules, bulletins, etc.

Many occasions have been found to correct erroneous statements appearing in the public press and elsewhere. You may recall among these Mr. La Farge's excellent reply in the "Independent" to a criticism of the classical conception of the Lincoln Memorial. In some cases Chairmen of sub-committees have traced to the source causes of dissatisfaction or misunderstanding and have established a truer point of view. Mr. Worthington, of the Baltimore Chapter, by means of interviews with an officer of the National Building Trades and Employes Association, which was putting out one-sided statements, was instrumental in arranging for a conference between that Association and the proper committee of the Institute to discuss all points at issue in connection with our standard documents.

Our committee, considering that anything which will tend to bring about a better understanding between the architect, the owner and the contractor constitutes most desirable public information, will endeavor to work with and assist all committees having to do with Quantity Surveying and bettering the conditions of estimating; improving of materials, workmanship and technical service; and standardizing the sizes of catalogues and reading matter. And it recommends that the Institute take steps to co-relate these professional activities.

The Committee has endeavored to fulfill all obligations imposed upon it by the last Convention in the distribution of resolutions, papers, notices and the like, and to keep in touch with all the other committees of the Institute whose work in any way affects the public weal. In this connection we must again refer to the value of a press clipping service in keeping chairmen of various Institute Committees informed of matters of public opinion affecting their work, and urge that **all** Chapters employ similar agencies in their Chapter work.

The suggestion was made to the Committees on Education and on Civic Improvement of our Institute and to the American Federation of Arts that they co-operate in arranging with the University of Texas to give lectures on architecture, town planning, painting and sculpture in the open air summer course of that Institution. As a result the American Federation of Arts, we understand, did provide such lectures on the latter two subjects.

One of our activities, which has been earnestly entered into by many of the sub-committees, has been to enlist the co-operation of the daily press in more firmly informing the public on architectural and allied subjects. This has inevitably included the part played by the Institute and by the profession in elevating the standard of design and in improving the construction of buildings and their accessories—subjects which are more and more becoming of vital interest to the public by reason of their close relationship to the enjoyment, the comfort and the safety of the whole people.

We have sought to bring about a clever understanding and an acknowledgment of the potent force of the profession in furthering all those co-related activities which lead to better housing conditions, improved educational facilities, safer working and playing places, better arranged cities and more orderly living.

The aims of a profession which is taking such a helpful part in the welfare of our communities cannot fail to appeal to all people, and the enumeration of its activities in the daily papers constitute items of interesting news and also of information to that public whose opinion they will gradually and inevitably mold.

Of one thing this committee is convinced, namely, that if the architects will bestir themselves to **do things** and take an active part in the **doing of things by others** they will **make** news, and as such it will be treated.

In several instances the newspapers have not only given more space and a more marked attention to the presentation of architectural and allied subjects and of news concerning professional activities, but have re-arranged their columns in order to better present this material. One newspaper has devoted a page to architecture, building and real estate, with an architectural illustration daily.

The Chairman of the Institute Committee has, in reading the proof sheets of The Journal each month, marked those articles or notices which seemed likely to prove of especial interest or value to certain magazines, newspapers or other publications, including, in some instances, those classed as "popular." A sufficient number of reprints has then been ordered to send one with a letter to the special editor or publisher selected, unless the publication was on the "exchange list" of The Journal, when a letter only would suffice.

When there appear articles of exceptional merit, like that in the "Saturday Evening Post" for October 4th, entitled "Throes of Building Committees," that in the "Delineator" of November on "Why Consult an Architect—and Now," or that in the Boston "Herald" on "The Architect," the Chairman asks all sub-committees to bring them to the notice of Chapter members that they may see for themselves what is being done by such non-technical publications toward informing the public and that they may encourage them by writing letters of appreciation or comment. Even the humorous weeklies have begun to find the architect an object for the shafts of satire, which indicates, at least, that he is being observed.

The following notice, which was featured in the Philadelphia "Public Ledger," is indicative of the reception accorded the services of the members of committees:

"The July number of the National Municipal Review says: On March 4, 1913, the Philadelphia Public Ledger, a widely known daily paper, began the publication of a weekly section devoted to City Planning, Architecture and Real Estate. The Committee on Public Information of the American Institute of Architects has been assisting the Public Ledger in the presentation of material. It suggests that here is an opportunity which lies open in other cities. Certainly it is unnecessary to enlarge upon the educational possibilities with which such work might be fraught."

A significant action and one likely to prove of value to other Chapters was taken by the Wisconsin Chapter when it passed a resolution that an extra copy of The Journal be sent each month to each local paper because it was considered very material to the interests of the public and the profession that the daily press be informed of the work being done by the Institute.

Following this excellent suggestion the Chairman wrote a letter to all sub-committees urging that similar action be taken by each Chapter, to the end that the activities of the Institute and of the profession, as chronicled in The Journal each month, might be dis-eminated through the press of the country. Too long has it been considered an axiom that the doings of professional organizations concern only themselves and therefore an extensive circulation of The Journal among the editorial offices of the newspapers of the country will, we hope, be welcomed by the papers as a means of dispelling this illusion.

The Executive Committees of the Philadelphia and of the Illinois Chapters have authorized the Chairmen of their Committees on Public Information to correspond with the editors of all principal local newspapers, offering to send, each month, a copy of The Journal to any person delegated by the editor to receive same. We understand that in Chicago alone nine papers will receive The Journal.

We are informed that the Chapter in San Francisco enthusiastically provided for such subscriptions to its leading papers. The Rhode Island Chapter, we understand has done likewise, and the Baltimore and other Chapters are looking toward similar action.

At a combined meeting of the committee with the Committee on Publications, the suggestion was made that one or more forms of postal cards be issued illustrating the historical Octagon House in Washington with an appropriate legend describing it as the home of the American Institute of Architects. If found practicable, the cards will be published for the use of the members and the public alike.

Toward the close of the year the committee learned with regret of the resignation of Secretary Brown from the committee. As this necessitated a change in membership, the President decided to increase the number of members. This committee now consists of Frederick L. Ackerman, Carl F. Gould, Eleazer B. Homer, Albert Kelsey, Francis J. MacDonnell, Arthur H. Scott and George Worthington, in addition to Frank C. Baldwin and the Chairman of the original committee. Nearly all of the appointees are chairmen of their local sub-committees and are thoroughly conversant with what has been accomplished through such committees. With this increase in numbers and with men selected for their known interest and activity in this work it is reasonable to expect that the Institute Committee will be able to accomplish much more than heretofore, though for the present these men have, necessarily, only been able to concentrate their attention upon extending the usefulness of the Convention.

The public, as well as the profession, has long since become quite familiar with the fact that the Forty seventh Convention was to be held in New Orleans in December — more notices having appeared this year in advance of the Convention than ever before during and after the Convention. The various chairmen and others prepared notices for the press and other publications and distributed hundreds of copies of the official program, all of which tended to insure the accuracy and completeness of the preliminary accounts concerning the Convention. Newspapers in all sections of the country received this information and, in recognition of the importance which the subject warranted, published it to an extent which has surely stimulated attendance on the part of architects, and which will increase the educational value of the Convention by inciting a general discussion of its proceedings. The committees will keep the public informed concerning all matters connected with this meeting which possess qualities of general interest. It will also aim to inform the members of the profession at large who cannot attend, of what the Institute in Convention is doing.

In drawing to the close of this report permit us to say that, while we have endeavored wherever possible to supplant the promises of last year with the accomplishments of this, we feel that the possibilities for usefulness of this committee are almost without limit.

We desire to thank the President and other officers and all those Chairmen and members of sub-committees who have so loyally helped us in carrying forward our work. We are confident that these members can be counted upon to counsel and assist those who will take up the work where we leave off. After all, one of the functions of the chairman of each of these committees is to originate activities for and to expand the usefulness of all individual members. He should provide them with just the opportunities they are really waiting for and assign them duties which they, as important and indivisable units of our great Institute, are eager and competent to perform.

He should search the archives of his mind for interesting facts, and should have the faculty of recognizing the value of others when he sees or hears them. And he must not keep them to himself. He should instantly disseminate them in channels of his choosing that their advantage may be multiplied to the greatest possible extent.

If he enters upon his work with an unbounded enthusiasm, it will surely become contagious and will be an inspiration to all.

We have such a task before us in educating the public to a fuller appreciation of the aesthetic and economic value, to the client and to the community, of a good architect's services that we must constantly present the subject in all its phases where the great public can see it. By this means, as well as through our work itself, we can bring about a recognition of the decided advantage, not to say the necessity, of employing an architect for all work, great or small, within the sphere of the profession.

Chairmen of sub-committees in each of the Chapters, in co-operation with the Secretaries and other officers, can see that the activities of the Chapter are more fully recorded, distributing the addresses of Presidents, extracts from reports of Secretaries, of Committees, etc., to The Journal and to newspapers and non-technical publications; can arrange for wider distribution of The Journal; can arrange with others to prepare special articles and publish and distribute them, can arrange to have papers read at public and semi-public meetings also to have lectures on architecture and architectural practice and city planning delivered before composite audiences in public libraries, before Civic Associations, Y. M. C. A's, Builders' Exchanges and many other bodies. They can arrange to have pictures illustrative of the finest examples of architecture hung in all public schools and many other places, and to place therein reproductions of the best paintings and sculptural work. They can write to the newspapers and popular publications correcting any erroneous statements calling attention

when buildings are illustrated without mentioning the architect's name, to this omission, congratulating the publishers when names are mentioned. They can keep the public, through the newspapers, informed about conventions, both before and after taking place, giving names of delegates as elected and so on. The opportunities surround us on all sides. What we must do is to see them and to take advantage of them. That is what is expected of our committee and of its sub-committees, but to do this we must seek and secure the co-operation of every officer and member of every Chapter in the American Institute of Architects. In doing this we will be serving one of the ends for which our committee has been created, namely, "to instruct the public on matters pertaining to architecture, that the general level of the public taste may be elevated and a demand for a higher standard of design and better type of construction shall result."

Respectfully submitted by

FRANK C. BALDWIN,
D. K. BOYD, Chairman,
(Of Committee before it was so recently enlarged.)

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The Proceedings of the 47th Annual Convention

Report of Committee on Allied Arts to the Forty-seventh Annual Convention of the American Institute of Architects:

The Committee on Allied Arts has endeavored to carry into effect the establishment of an annual prize for collaborative work at the School of Rome, as suggested in its report to the Forty-sixth Annual Convention of the American Institute of Architects and as recommended by resolution of that body.

We regret the unavoidable delays encountered in arranging details with the authorities of the Roman School, and to the end that further delays be avoided, we suggest that the recommendation of the last convention be by this convention made an instruction.

We have taken to heart the findings of the committee appointed to report on the reports of Standing Committees, and wish to thank that committee for its support of our suggestions; we doubt, however, the wisdom of further extending American Institute machinery by adding Chapter Sub-Committees of the Committee on Allied Arts, as recommended. We ask, rather, to be allowed to define the full list of Arts that are to be officially recognized as "Allied Arts" and to add to the roster of our committee a regular representative of each art, science, or craft, that may be so recognized. As a result of the last convention's action, a representative of the landscapist's art has been added to our committee, thus breaking away from the traditional triumvirate—Architecture, Sculpture and Painting, and giving recognition once for all, to this fundamental science, as an "Allied Art."

The suggestion that our work should, to a large extent, be co-operative with that of the Committee on Education, is accepted with alacrity. We go so far as to hope that the Committee on Education may be willing to turn its most active attention to the providing of means for collaborative study for American students right here at home.

Mr. Blashfield's associates in the Committee on Allied Arts take this opportunity to acknowledge their special obligation to Mr. Blashfield for so ably emphasizing the principles for which the committee stands, in his admirable paper read before the last American Institute Convention, and also to Mr. Cass Gilbert for his prompt and graceful appreciation of Mr. Blashfield's effort, uttered from the floor of the convention.

Summarizing the present ambitions of our committee:

We hope that the convention now in session may find it advisable to make such recommendations and give such instructions as shall make the American Institute of Architects proposed annual prize for collaborative work at the Roman School an accomplished fact;

We hope that steps may be taken to so modify our constitution and by-laws, that a representative of each of the Arts accepted as an "Allied Art," may have regular membership in this committee, whether holding membership in the American Institute of Architects, or not;

We hope that our committee may be instructed to define that Arts to be officially recognized as belonging to the Allied Arts group, and to add to its membership an eminent representative of each of the branches so added to our present list;

We hope that the Committee on Education may be instructed to foster in all proper ways collaborative study and the establishment of means to that end;

We hope that the Committee on Publicity and the Journal of the Institute may be instructed to spread abroad, as a fundamental American Institute principle, the belief that sympathetic, intelligent collaboration among the Allied Arts is, and always has been, the only sure road to a worthy architecture in any age or any land;

And finally we hope that the whole membership of the American Institute of Architects will help the campaign for more effective combined effort in architectural work, by individually sounding a warning against architectural specialism and by shouting whenever and wherever possible the slogan of its Allied Arts Committee-Collaboration!

E. H. BLASHFIELD,
CHARLES A. PLATT,
LORADO TAFT,
H. VAN BUREN MAGONIGLE,
THOMAS R. KIMBALL, Chairman.

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Prosperity

No matter how we look at business conditions, the great mass of people keep on eating and living and clothing themselves. They build new houses, remodel old ones and "keep a goin'." To keep their trade we will have to keep on going after it.

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STATEMENT OF THE OWNERSHIP, MANAGEMENT, CIRCULATION, ETC., OF "THE PACIFIC COAST ARCHITECT," PUBLISHED MONTHLY, 725 CHRONICLE BLDG., SAN FRANCISCO, CAL.

Editor and Manager - - - - J. A. Drummond
Publishers - - - - Coast Publishing Co., Inc.
725 Chronicle Bldg., San Francisco.

The owners holding one percent or more of stock are:
J. A. Drummond, 725 Chronicle Bldg., San Francisco, Calif.
There are no bondholders, mortgagees, or other security holders.

J. A. DRUMMOND, Editor and Manager.

Sworn to and subscribed before me this twenty-sixth day of March, nineteen hundred and fourteen.

PERCY E. TOWNE,
Notary Public, San Francisco, Calif.

My commission expires January 11, 1916.

Panama Canal Statistics

Length, of Canal, shore to shore, 41½ miles.
Length, deep water to deep water, 50 miles.
Minimum depth of Canal, 41 feet.
Width of Canal channel, from 300 to 1,000 feet.
Sea-level approach from deep water, Atlantic side, to Gatun Locks, about 7 miles long.
High level canal from Gatun to Pedro Miguel, about 31½ miles long and 85 feet above sea level.
Sea-level approach from deep water, Pacific side, to Miraflores Locks, about 8 miles.
Time needed for passage of ships, 10 hours.
Three tiers of duplicate locks at Gatun, Atlantic side.
Two tiers of duplicate locks at Miraflores and one at Pedro Miguel, Pacific side.
All lock chambers have a usable length of 1,000 feet and a width of 110 feet.
Lift of each tier of locks, about 28 feet.
Gatun Dam, length of crest, about 8,000 feet.
Gatun Dam, extreme width, 2,100 feet.
Gatun Dam will form lake about 164 square miles in area.
Culebra Cut, 9 miles long.
Tidal oscillation, Atlantic side, 2½ feet.
Tidal oscillation, Pacific side, 21 feet.
Official opening of Canal, January 1, 1915.
Total excavation, 242,135,000 cubic yards.
Total amount of concrete, 5,000,000 cubic yards.
Average number of men employed, 45,000.
100 steam shovels and 18 dredges on the job.
Slides into Culebra Cut, 20,260,000 cubic yards.
Suez Canal tolls in 1912 were $1.32 per ton.
Area Canal Zone, 448 square miles.
Estimated total cost to the U. S., $375,000,000.

Better Fire Protection

Is the architect responsible in part for the enormous fire losses in this country, is it within his power to diminish those losses, and if so should the architects of the country make special efforts to insure a greater exemption of buildings from this destructive toll were among the questions touched upon at the regular monthly meeting of the Chicago Architects' Business Association, held Tuesday evening, February 24. It was one of several interesting subjects broached.

This particular topic came into consideration when one of the members, Frank D. Chase, also president of the recently organized Chicago chapter of the National Fire Protection Association, made some remarks on the aims and purposes of that organization. His statements were thought-producing. They raised the question whether the energies of the architectural profession should be specially directed towards the elimination or decrease of fire losses, to a greater extent than they now are.

It is not purely an ethical or public-spirited proposition. The element of professional success enters into it. As one speaker said, the only asset an architect possesses, aside from his knowledge and ability, is his satisfied clients. At the outstart of his remarks Mr. Chase referred to the relatively enormous fire losses in the United States as compared with those of European countries. The American annual fire waste amounts to nearly $300,000,000. It is nearly $3 per capita, while in England the per capita loss is only 35 cents. This loss, Mr Chase said, must be reduced and the architects must help to reduce it. Their vocation in the designing of buildings and in the supervision of construction placed them directly in line for assistance in this important work. The speaker referred to an instance in his own practice, the construction of an Indiana factory. The owner brought plans, which from a fire insurance point of view were simply "rotten." He refused to undertake the work and when finally permitted to proceed with his own plans he reduced the insurance on the building 50 cents per $100, resulting in a considerable net saving.

And Mr. Chase spoke of the purposes of the National Fire Protection Association, to make standards under guidance of which the fire waste may be checked, and to educate people to the observance of these standards. The Chicago chapter has a membership of 250, which should, he said, be increased to 5,000. The next annual convention of the national organization is to be held in Chicago in May. The literature it sends out constantly is highly useful to the architect and valuable to the people at large. By way of illustration he mentioned among others a standard building ordinance designed for small cities and towns, too small to have a building code, but which if adopted would safeguard the people of those communities.

Trade Notes

Architect A. C. Lutzens moved to 504 Underwood building, San Francisco.

Architect W. B. Bell, Portland, moved from the Worcester block to 550 Sherlock building.

Architect Carl Jabelousky, Spokane, has moved his office from 441 Peyton building to 737 same building.

Architect R. A. Nicolis of Vancouver, B. C., has moved from the Rogers building to 926 Birks building.

Architect Ernest J. Kump, Rowell building, Fresno, desires literature and samples for his newly opened office.

Architect A. J. Mazuritte has moved his office from 276 Bacon building, to 463 Albany block, Oakland, Cal.

Architect T. Thoresen, formerly in the L. A. Investment building, Los Angeles, has opened offices in Gooding, Ida.

Architect Erwin Schaefer of Oakland has moved from the Bacon building to larger quarters in the Plaza building.

Architect Carl Nuese has recently withdrawn from the firm of Wyss-Thalman Co., architects, of Hewes building, San Francisco.

Arthur G. Lindley, architectural designer, has moved his offices from 1101 Hollingsworth building to suite 412 in the same building.

Architect V. O. Wallingford has moved his office from 623 Timkin building, San Diego, Cal., to 315 Goodrich building, Phoenix, Ariz.

Greene & Finger, architects of Houston and Galveston, Texas, have opened a new office in the First National Bank building at Houston.

Architects Needham & Cline have moved their offices from the Wright & Callender building to 615-6 Brockman building, Los Angeles, Cal.

Architect Aaron H. Gould, with offices until recently at the Worcester building, Portland, is now located in the Henry building, Portland.

Architect Leonard L. Jones has moved his offices from the I. W. Hellman building to 1125 Central building, where he will have a suite of rooms.

Architect C. Werner, formerly of O'Brien & Werner, San Francisco, has opened his office at 952 Phelan building. Samples and catalogues are requested.

Birger H. Ewing and Clarence P. Tedford have established architectural offices in rooms 12 and 13, Orange Co. Savings & Trust Co. building, Santa Ana.

Gladding, McBean & Co. furnished all the architectural terra cotta used on the Orpheum theatre, Salt Lake City, Utah. G. Albert Lansburg, architect, San Francisco.

The architectural firm of Keith & Whitehouse of Spokane, Wash., has been dissolved, Mr. G. H. Keith and H. C. Whitehouse taking separate offices in the Hutton building.

Architects Sweatt & Levesque, Mohawk building, Spokane, Wash., will hereafter be known as Sweatt, Levesque & Diamond, C. T. Diamond having become associated with the firm.

The Hoffman Heater Co., Lorain, Ohio, have opened a branch office and store at 397 Sutter street, San Francisco. They have installed an elegant and large display of their heaters.

Mr. T. G. Arrowsmith is in charge of the Pacific Coast branch office. All parties will be dealing direct with the firm and not through any agency.

Architect W. S. Greene has withdrawn from the firm of Blanchard, Greene & Tifal, and will continue the practice of architecture independently at 922 Van Nuys building, Los Angeles.

Architect Otto Janssen with Walter E. Welch, associate, has opened offices at 422 Chamber of Commerce building. Catalogues, price lists and other trade literature and samples will be appreciated.

Architect C. A. Houghtaling, with offices at 507 Henry building, Portland, has taken L. L. Dougan, an architectural designer, into partnership, and the firm name hereafter will be Houghtaling & Dougan.

Architect N. W. Mohr, formerly at 409 Bankers' Inv. building, San Francisco, and of the firm Mohr Bros., architects, is now at 302 same building, and Oscar Mohr, the other member of the firm, will operate independently.

Architects Sylvanus B. Marston, and Garrett B. Van Pelt, Jr., announce their association together under the firm name of Marston & Van Pelt. The offices will be continued in rooms 600-602 Chamber of Commerce building, Pasadena, Cal.

Architects Chas. E. Butner and Edw. Glass of Fresno, have formed a partnership and have offices in the Republican building in that city. Mr. Butner is recently from Colorado, where he was associated with the firm of McLaren & Thomas.

R. N. Nason and company is especially proud of the work that has been done with Opaque Flat Finish on the Wiltshire Hotel building, on Stockton street, near Sutter, the large fifteen-story structure, of which McDonald & McDonald are the architects, and Gus V. Daniels, the painter.

Ten architects, one each in San Francisco, Philadelphia, Baltimore, Boston, St. Louis, Chicago and Washington, and three in New York, have been invited by the George Washington Memorial association to compete in drawing plans for the George Washington Memorial building to be built at Washington, D. C.

The architectural firm of Neher & Skilling, 709 Garland building, has been dissolved by mutual consent. Mr. Skilling will continue in the same office and Mr. Neher will spend the summer in Europe, but meanwhile will make his headquarters with Mr. Skilling while devoting his time to personal business affairs.

The work that was done with Opaque Flat Finish on this job speaks for itself. It produces a soft velvet tint, which is washable, and thus is the article that all hotel and apartment house people can see the beauty in using on account that the walls can be easily washed with soap and water, so that they are as good as ever, which is impossible with an ordinary tint.

Mr. J. B. Losey, special architectural representative of Berry Bros., Detroit, Mich., recently arrived in San Francisco to exploit the advantages and fine points of their famous brands of varnish before the western trade. Their goods are very well known, being highly advertised from every angle, and they have an office and factory in San Francisco, also carry the largest stock of anyone on the coast.

G. Bernfield, a prominent architect of Johannesburg, South Africa, while on a visit in San Francisco recently was very much impressed with the western type of American architecture. He made a special mention of this fact and was also much impressed with the western spirit and method of doing business. He is anticipating locating in California if he can arrange his business matters in South Africa.

Novel Advertising

Moving picture shows are utilized nowadays both to entertain and advertise. W. P. Fuller & Company, the paint people, have sent out a very entertaining photo play wherein a story of household interest is told, environed by clever advertising of the firm. The towns on the circuit are billed in the same way as is done in the show business. A dealer's store, with ample window space, is secured, where demonstrations are given during the day, showing the practical application and finish of the advertised article. At night the public is invited to view the moving picture, which is thrown on a screen inside the store window. Crowds attend the evening entertainment and are evidently much pleased with the "Tale of Paint" shown. This modern method of advertising has proven a big factor in creating a demand for a paint specialty that every household needs.

CALIFORNIA.

San Francisco—Architects MacDonald & MacDonald, Holbrook building, will prepare plans for the construction of a seven-story and basement reinforced concrete addition to be made to the Union Square Hotel at Post and Stockton streets, which will cost $162,000.

Architect W. G. Hind, 46 Kearny street, is taking figures for a five-story and basement brick apartment house to be erected for Dr. Clyde Payne on Bush and Stockton streets, at a cost of $35,000.

Architect C. A. Meussdorffer, Humboldt Bank building, has completed plans for the construction of a seven-story and basement reinforced concrete apartment house to be erected at the corner of Powell and California streets for A. W. Wilson, and will cost $150,000.

Architects Rousseau & Rousseau, Monadnock building, have completed plans for a six-story and basement hotel and store building for P. J. Garland, to be erected at the corner of Geary and Larkins streets, and to cost $125,000.

Architect L. Mastropasqua, 580 Washington street, has completed plans for a four-story and basement reinforced concrete hotel for Nicola Capurro, 1351 Grant avenue, to be erected on the corner of Broadway and Bartol place.

Architects Smith & Stewart, 244 Kearny street, have nearly completed plans for a seven-story and basement brick and steel hotel to be erected on the north side of O'Farrell street near Taylor, and to cost $75,000.

Architect Lewis P. Hobart, Crocker building, will complete working drawings for the new hospital buildings which are to be erected at the Affiliated Colleges by the Regents of the University of California. It is to be Class A type and will cost about $600,000.

Los Angeles—Architects Morgan, Walls & Morgan, 1127 Van Nuys building, have completed plans for the construction of a twelve-story and basement office building to be erected at the northeast corner of Seventh and Broadway, for the Hass Building company of San Francisco. It will be Class A construction and of reinforced concrete, and will cost $450,000.

Architect Myron Hunt, Hibernian building, is taking bids on the revised plans for the proposed music hall at Pomona College.

Architect John B. Nicholson, 912 Wright & Callender building, has completed plans for a four-story store and hotel building to be erected on East Sixth street near San Pedro street, for Mr. Phillips. The cost will be about $40,000.

Architect J. H. Seehorn, 328 South Clay street, has completed plans for two fireproof buildings to be erected on Sunset boulevard near Hill street, for the Missionary Sisters of the Sacred Heart. They will cost about $50,000

Los Angeles—Architect Chas. Gordon, Los Angeles Inv. building, is preparing plans for a twelve-story hotel, Class A construction, to be erected at 136-40 South Spring street, by Verne H. Carter, and to cost $250,000.

Architects Webb & O'Neil, Lankershim building, are now preparing plans for a four story and basement brick and steel apartment house to be erected on Figueroa street near Fourth, and to cost $70,000.

Pasadena—Architects Parkinson & Bergstrum, 1035 Security building, Los Angeles, have been instructed to complete plans and specifications for a Class A reinforced concrete office building to be built at the northeast corner of East Colorada street and Marengo avenue, Pasadena, for the Citizens Savings Bank of that city. The cost will be about $100,000.

Berkeley—Architect Wm. H. Ratcliff, Jr., First National Bank building, Berkeley, has completed working drawings for three frame fire houses to be erected in the City of Berkeley. One building will be erected on LeRoy street, one on Ellis street, and the third on Claremont.

Architect Ratcliff has also completed plans for a five-story and basement apartment house to be erected for Geo. Clark and J. A. Elston, Berkeley. It will be Class C construction and will cost $85,000.

Oakland—Architects Thomas & Oliver, Pantages Theatre building, has prepared plans for a seven story and basement brick and steel apartment house for Roger Coit, to cost $80,000.

Glendale—Architect Norman F. Marsh, 212 Broadway, Central building, is completing working plans for the two new brick high school buildings to be erected at Glendale. The cost will be about $65,000.

Sacramento—Architect James Seadler, Sacramento, has completed plans for a two to four-story and basement reinforced concrete packing plant, for Swanton Meat Packing Co. This is to be reinforced concrete construction and to cost $200,000.

Brawley—Architect L. Roehrig, American Bank building, Los Angeles, is preparing plans for a four story and basement brick hotel to be erected by the Brawley Imperial Co., at a cost of $100,000.

Alturas—Architect de Longschamps of Reno, Nev., has completed working drawings for the new County Court House to be erected for Modoc county in Alturas, at a cost of approximately $90,000.

Bishop—Architect G. C. Clements of Bishop, is taking figures for the construction of a one story and basement reinforced concrete school which is to be erected at Bishop at a cost of $35,000.

Bakersfield—Architect Thomas B. Wiseman, Producers' National Bank building, Bakersfield, is preparing plans for a two-story and basement frame Parental school for Kern county.

Corcoran—Architect J. Carl Thayer, Fresno, is preparing plans for a two story and basement brick school for the Corcoran Union High school, at a cost of $40,000.

Hillsborough—Architect Willis Polk, Merchants Exchange building, has been commissioned to prepare plans for a large country home for William Bourn, president of the Spring Valley Water company, at Hillsborough, which will cost $200,000.

OREGON.

Portland, Ore.—Architects Doyle & Patterson will prepare plans for a twelve-story building for Meier & Frank, Portland, Ore., the cost of which will be $1,250,000.

Preliminary plans have been prepared for the proposed Natatorium, by Architects Whitehouse & Foulhoux, Wilcox building. The building will cost $75,000.

Architects Tourtellotte & Hummel, Rothchild building, Portland, are preparing plans for a five story and basement reinforced concrete hospital for the Emanuel Lutheran hospital, 200 Tenth street, at a cost of $45,000.

Architect Aaron H. Gould, Henry building, has been commissioned to prepare plans for a reinforced concrete theatre to be erected on Stock and Park streets, and to cost $100,000.

A deal was recently closed between the Blake McFall Paper Co. and O. F. Heintz of the Pacific Iron Works, for the leasing of a large building to be built on property owned by Mr. Heintz, located at East Ankeny street, between East Second and Third streets. It will cost $100,000 and will be five stories high.

Architect J. D. Daniloff will probably be commissioned to prepare plans for a $30,000 lodge and club building to be erected for the B'nai B'rith Building association.

Architects Hunziker & Preusse, Eugene, have been commissioned to prepare plans for a three story and basement brick school house for the City of Eugene, to cost $110,000.

Eugene, Ore.—Architects Hunzicker & Preusse are preparing plans for the erection of a five story pressed brick business building structure to cost $50,000.

La Grande, Ore.—Architects Houghtaling & Dougan, Henry building, Portland, are making plans for a Catholic church at La Grande, Ore., to cost close to $40,000. The structure will be of stone, brick and terra cotta.

Salem, Ore.—The State Architect Knighton is completing plans for the State Industrial School for Girls, the building to be erected in this city at a cost of $60,000.

Pendleton, Ore.—Architects Tourtellotte & Hummel, Rothchild building, Portland, have the plans for improvements on the Pendleton Hotel, which will cost $45,000.

Seaside, Ore.—Architect F. Manson White, Seaside, has completed plans for a two story and basement reinforced concrete hotel and store building to be erected for Alex Gilbert & Son, at a cost of $50,000.

Klamath Falls, Ore.—Architect Earl Veghte has been commissioned to prepare plans for a new city hall, pressed brick construction, and to cost $30,000.

Sutherlin, Ore.—Architect Earl A. Roberts of Portland, is preparing plans for a hotel and store building to be erected at Sutherlin, Ore. The structure will cost $30,000.

WASHINGTON.

Seattle, Wash.—The Henry Broderick Co., Inc., has taken a 99-year lease on site at the corner of Second avenue and contemplates the erection of a modern fire-proof skyscraper of more than ten stories at a cost of $600,000.

Seattle, Wash.—Architect E. W. Houghton, Collins building, is completing plans for the construction of the four story $100,000 concrete and steel theater building for August Paulsen in Spokane, Wash.

Seattle, Wash.—Architect A. B. Praena, Railway Exc. building, is completing plans for a $50,000 shingle mill to be erected in Everett, Wash., by the C. B. Lumber & Shingle Co.

Oroville, Wash.—Plans are being prepared by Architect Harlan Thomas, Arcade building, this city, for the constructing of a one-story and basement concrete building for the First National Bank at Oroville, Wash., at a cost of $10,000.

Olympia, Wash.—Seattle Architects Blackwell & Baker have prepared plans and specifications for the joint Olympia and Thurston County Carnegie Library to be built at the corner of Seventh and Franklin streets. Work to start on structure not later than April 1st.

Tacoma, Wash.—Bids are now being taken by Architect R. E. Borhek, Savage-Scofield building, for the $50,000 theater building for Eugene Levy.

MISCELLANEOUS.

Denver, Colo.—Architects Fisher & Fisher are making plans for a $40,000 apartment house at 1442 Grant street.

Revised plans for the new postoffice are now being prepared by the Government architect.

Colorado Springs, Colo.—The Moose Lodge are anticipating the expenditure of $2,000,000 for a sanatarium for tuberculosis in this locality.

Roosevelt, Mt.—Watkins & Birch, architects of Salt Lake City, are preparing plans for the high school, to cost $40,000.

Reno, Nev.—Architect W. J. De Longschamps has completed plans for the Nevada building at the Exposition, San Francisco, to cost $25,000.

Casper, Wyo.—W. C. Metzger announces that plans for the erection of a brewery at this place will be prepared at once by Architect Fred Widmann. Estimated cost $100,000.

Douglas, Wyo.—Architects Rose & Peterson, Kansas City, Mo., have prepared plans for the erection of a $45,000 high school building at this place.

Lewistown, Mont.—Plans are being prepared by Architects Wasmansdorff & Eastmen for the erection of a new building by the Fergus County Realty association, which will be used as the local postoffice. Estimated cost to be $30,000.

Douglas, Wyo.—Architects Rose & Peterson of Kansas City, Mo., are preparing plans and specifications for the erection of a high school building here. It will cost $45,000.

New Westminster, B. C.—Architect J. H. Bowman is making plans to rebuild the Woodstock Co. Mill, recently destroyed by fire. New building to cost $75,000.

Vancouver, B. C.—Plans were prepared by Architects Tegan & Vezina, Metropolitan building, for the proposed brick school and club building on Haro street for the Church of the Holy Rosary, to cost $100,000.

Architect J. J. Donnellan, of Vancouver, will prepare plans for the theatre to be erected here for Alexander Pantages, to cost $300,000.

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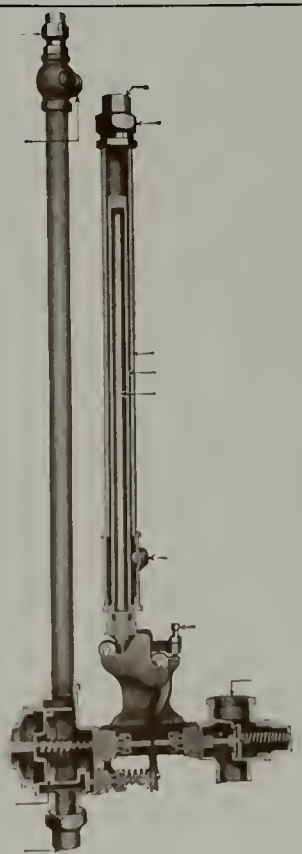

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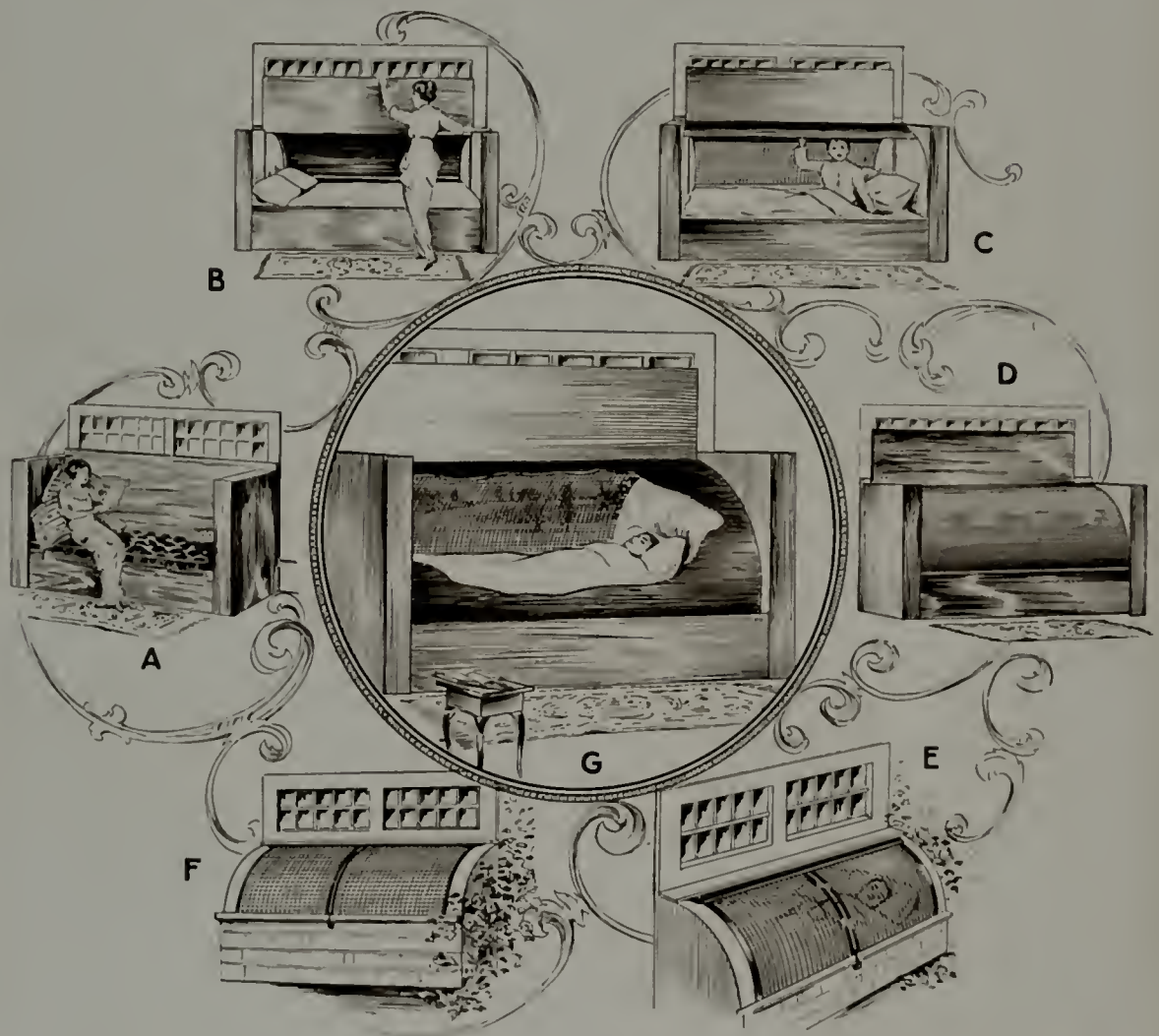

As you will observe from the above illustrations, about one-third of the CO-RAN FRESH AIR BED is concealed under the seat of a Davenport (A) in the room proper and the rest in an alcove-like addition extending outside about two and one-half feet (F). The dome-shaped wall of the alcove revolves, and by simply swinging it over to the inside (C) the occupant finds himself out in the open, protected by a heavy wire screen and adjustable storm curtain (E). By reversing the operation, the bed is really inside again—just as much so in fact, to all intents and purposes, as any other article in the room, thereby making it possible for one to retire in his room, sleep in the life-giving fresh air all night, and arise in the morning again in the warmth and comfort of his own room.

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THE PACIFIC COAST ARCHITECT

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EDITORIAL.

Annual Meeting of the State Board

The California State Board of Architecture met in the Van Nuys Hotel at Los Angeles on April 14th for the annual meeting of the board. The following members attended: Messrs. John P. Krempel, John Bakewell, Jr., Frederick L. Roehrig, Sylvain Schnaittacher, Sumner P. Hunt and Will S. Hebbard. Routine business was transacted and the reports of the two district boards received for the past year. A notable departure, the holding of the written examinations of the board at the State University at Berkeley and the University of Southern California at Los Angeles, was found to meet with general approval.

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The New San Francisco

It is with considerable local pride that our city commemorates the anniversary of the great conflagration which occurred on April the 18th, 1906. When you look upon the San Francisco of today you are impressed with the wonders wrought thereby, and the thought arises "Was it not all for the best?"

You will readily consider the all important feature of this rebuilding of the entire business section of the city, containing approximately four square miles in area. Your attention will readily dwell on the duty and skill of the Architectural profession, and the work they have performed, also the necessity of fire-proof construction.

There was a great lesson learned when you find that the so-called fire-proof buildings crumbled to ruins before the on-rush of the greatest of fires. This proves the need of skillful knowledge on the part of the Architect, and he must know if not previously, the need of more proficiency in the execution of his plans and specifications to the letter. This must be done regardless of the desire of the owner to build a $100,000 building with a capital of $50,000 in order to make a big outside shell appearance, and to obtain as much renting space as possible for the least outlay.

We have had experience and it has been a dear one, although how soon it is all forgotten by the ambitious owner.

Definite Specifications

Articles upon the above subject have appeared recently in a number of architectural publications, including "The Pacific Coast Architect," as well as a few papers not strictly architectural, covering only the general contracting and building industries.

We are of the opinion that an Architect knows, or should know what he wants, therefore he should specify it.

Using the words "or equal," if more than one brand or article is to be used, is not sufficient unless he stipulates what that "equal" is.

An Architect employed for the drawings and executing of plans, specifications, etc., does not discharge his duty if his specifications lack in definiteness; that is, if such terms as "or equal" are used such lack of definiteness then occurs.

If an Architect agrees that a material or its "equal" be permitted to enter a structure, it tends to the substitution, and cheapens construction, weakens the completed structure which sometimes is soon in need of repairs, or is in a few years condemned.

The Architectural profession endeavoring to uplift the standard of building construction, making it of a nature in keeping with the more glorious precedents of the past, requires skilful experience and a general knowledge of material to be used. This requires deep study and experience in order to determine what should be specified, and it should be so stipulated that any material to be used should be mentioned by name. Specifications can then be complied with. This is the duty of an Architect; a duty not always fulfilled and one but little understood by the outside public. In specification writing there can be no "or equal." A thing is either better or not as good, and too large a scope for argument and contention is left if no definite thing is mentioned. If the desired grade of material is not available for use, the Architect should investigate this, and then specify what is the next best thing. Such decision should be made before any contract is signed.

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Illegal Practitioner Convicted

O. E. Evans of 2367 Mission street was found guilty by a jury in Judge Crist's Department of the San Francisco Police Court, on April 21st, for practicing architecture without a certificate, as required by law. This is a notable victory for the State Board and its attorney, John R. Selby, who acted as special prosecutor. Evans was found guilty of violating the law, although he was in the habit of following the word "architect" by the letters "N. C.," and also displaced a sign with the same letters under "architect." Sentence is to be pronounced May 7th. Other prosecutions will follow.

California Cement

San Francisco's big conflagration, as well as a great many others, has demonstrated the fire-resisting qualities of Portland cement concrete, and no doubt that is why there is not a permanent fire-proof building in this city, but what has concrete in its make up, either as protection for steel frame, or as structural members.

Time has shown its durability, and made its use universal. There is not a building finished, or under construction, that does not contain cement, either in the form of concrete, plaster, or mortar. Not only is it used in buildings, but in our famous auxiliary water supply reservoirs, our pavements, our permanent highways, and our big sewer systems, in fact, in almost every form of construction.

San Francisco has just recently, through its commercial bodies and "Insurance Day" at the Panama-Pacific International Exposition grounds, celebrated "Eight Years After." The way the city has been rebuilt with its many beautiful and permanent structures, is considered one of the marvels of the world, yet very few people know or even realize the big factor that California cements have been in their rehabilitation.

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Disappearing Bed for Small Apartments

A patented disappearing bed recently placed on the market is so constructed that it is entirely concealed in the ceiling, and is raised and lowered in an instant by turning a crank. A continuous current of air passes around it when not in use, thus airing the bed clothing without removing. An extra drop ceiling leaves no opening when the bed is down.

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Trade Paper Problems

The important part played by the so-called "Trade Papers" in commercial life is often under-estimated. An interesting glance at the functions of the trade paper was given in a recent address by S. H. Ditchett, editor of the Dry Goods Economist.

"In his way the trade paper publisher has difficulties away beyond those of the daily paper and immensely beyond those of the magazine," said Mr. Ditchett. "For the trade paper is talking to thousands of practical, hard-headed business men, and it deals with subjects which those men—if the trade paper is not thoroughly on to its job—will know a vast deal more about than the trade paper does.

The Trade Paper Must Help.

"The majority of publications are issued not to tell how, but to interest—it may be, to pass an idle hour. But the trade paper is interesting only in so far as it can tell how. It has got to help its readers. And to keep ahead of those readers it has got to keep everlastingly studying their problems.

Accuracy the Prime Essential.

"Another thing: the statements made in a daily paper, or in a magazine, are quickly forgotten by the reader. Few daily papers aim at strict accuracy. They admit that the haste with which their matter is prepared and put into printed form makes absolute accuracy impossible.

"But in the trade paper accuracy is the one great, vital essential. Not only are your readers in a position to find you out if you're wrong. They can't take your advice or accept your information, without running a serious risk—very often, a big money risk. For if the trade paper is a guide at all, it is a guide in the purchase of products—it may be merchandise for re-selling, or it may be plant equipment.

Fireproof Construction

Philip H. Bevier, a civil engineer, addressing a society at Orange, N. J., on "Fireproof Construction," said:

"At the present price of building material, fireproof construction can be erected at a cost not to exceed 10 or 15 per cent more than non-fireproof, and when we consider that fireproof buildings deteriorate about one-ninth of 1 per cent per year as compared to 4 per cent of ordinary buildings; that they rent better, and that money can be borrowed on them on better terms; that they are vermin proof, cooler in summer and warmer in winter, it would certainly seem a part of wisdom and self-interest to adopt a better method in every case when the building is to be of a permanent character.

"When a man builds a house in the country, it may be that he has a right to jeopardize his own life and property and those of his family and gamble with the insurance companies, but there is no question that the owner of property in a city or town has no right to erect a structure which will be a menace to the safety of the property of the adjacent owner. This principle is clearly recognized in practice, and many of the smaller cities are adopting building codes requiring fireproof construction throughout a certain portion of the business section, and semi-fireproof buildings in less congested districts.

"If one-half of the money spent by American cities for fire losses was spent for better building construction the annual loss by fire would soon begin to decrease. Improvements along the line of better construction can only come gradually. It can and should be hastened in thickly settled communities by stringent building laws. City officials must be awakened to their responsibilities and the individual shown that his own pecuniary interests lie in lessening the first waste. Old buildings cannot be torn down at once and rebuilt, but we can see to it that no more firetraps shall be built where they are a menace to other structures."

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Architects and General Contractors

The elimination of contracts for plumbing, electrical heating, sheet metal work and many other important parts of building construction from the general contract is a matter that is receiving wide attention. A movement is on foot to secure a national law in reference to federal government work, and laws of a similar character in the various states. The disposition on the part of architects to participate in this movement may be due in some measure to the inroads upon their work that have resulted from large general contractors maintaining a staff of engineers and draftsmen as well as experts in building design and construction. Some general contractors are prepared to submit to those who contemplate the erection of a manufacturing plant or a building of any character not only the plans from which the building will be erected, but also to place at the disposal of their client an organization which is used to working together and is trained to produce the desired results without annoying delays and conflicts. Such construction concerns have developed in many different centers and have substantially curtailed the business of the architect, as well as absorbing business that would otherwise go to special contractors. Under the circumstances it seems that those who are working for the separation of different contracts to avoid the risk of loss which has been too frequent when working under a general contractor are to have substantial aid in their campaign from the architects, an influence which is not to be undervalued.

Popular Interest in City Planning

Between eight and ten years ago, there was widespread discussion and much endeavor made to interest and stimulate public opinion in that stage of city planning evolution, which came to be known as the "City Beautiful Movement."

Civic and legislative bodies of nearly every American municipality of any consequence were spurred on by reckless enthusiasts to provide means for City Adornment and Improvement Commissions. Elaborate boulevards and parking schemes were proposed, and every phase of city adornment from window boxes to the policeman's uniform was discussed and considered. Enthusiasm was great until it was found that in nearly every instance the funds required for the execution of the various projects involved amounts of money far beyond the bonding or taxing capacity of the community. Furthermore, the support of the business element was lost through a failure to show what definite practical results would accrue from the suggested improvements.

Few of the schemes disclosed any scientific investigation into such problems as housing and transportation. It is conceded that during this period real city planning received a set-back from which it is only just beginning to recover.

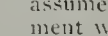
Today we are going through a stage somewhat similar to that of eight or ten years ago, but with this difference. The scientific investigation of transportation and housing problems, made to relieve congestion in cities, furnish us with a starting point from which intelligent city planning may result. The same keen interest now prevails as then existed, but it is mostly confined to those who are professionally concerned: architects, engineers, municipal officers and social reformers. Public interest must be aroused, as nothing in this direction can be accomplished without the co-operation of the public. To quote Frederick Law Olmstead, "There are three logical divisions in city planning improvement. First, the winning of public support; second, the planning itself, and third, the translation of planning into facts."

In order to enlist public interest in city planning it almost goes without saying that there must be some form of education. Any quantity of material of a more or less technical nature is being published on the subject, but very little of which is of real interest to the layman. It is not necessary to concern ourselves with the education of the enthusiasts, but we must provide for the average citizen, whose vote is necessary to support these movements. As certain forms of dramatic entertainment are devised to appeal to the tired business man, so to some degree should articles on city planning and exhibitions be of such a nature as to tell their story in a simple, interesting and entertaining manner.

There recently was shown in California, in the cities of Oakland, San Francisco and Los Angeles, an exhibition presented by the American City Bureau of New York. Previous to the coming of the exhibition the authorities and civic societies of each city were asked to provide means for guaranteeing the expense of showing the exhibit. It was given out and the impression allowed to prevail that this exhibit was an official gathering of data of the Heights of Building Commission of the City of New York. We do not wish to detract from the value of the exhibit to the professional, but from observation in the three cities where it was shown, there was very little to interest the layman. The exhibit consisted for the most part of photographs and magazine clippings, mounted on placards, and there was more or less illuminating text printed on the sheets. The illustrations shown were not of the best examples, and in many instances the buildings were poor exemplars of architectural work. The photographs were of small size, and the magazine articles and illustrations were taken directly, and were in no wise enlarged. It was difficult for even one familiar with the subject to attempt to decipher some of the matter shown without the aid of a reading glass. The maps shown were of the same character, there were no models or work in relief.

As far as the Heights of Building Commission was concerned, if the material came at all from the original source, it was confined to printed clippings of the commission's reports.

In Oakland the exhibition was free, and as it was shown in the new City Hall, attracted quite a crowd. No particular interest was displayed in any of the exhibits, except that which was added locally, such as a relief map of Oakland Harbor, maps and excellent photographs of residential developments. In San Francisco an admission was charged, and the attendance was negligible, despite the fact that there was considerable newspaper publicity. Several visits to the exhibit showed the non-professionals gathered around Guerin's drawings of the San Francisco Civic Center Buildings, relief maps, and several surburban developments, all of which were local additions to the exhibit. In Los Angeles admission was free, and the attendance and interest was so limited that the local architects were begged to send something of interest to the exhibit. It may be thought that the interest of the local exhibit was by reason of familiarity, but it must be confessed that the local additions were far more graphic than anything in the original exhibition. It seems childish to assume that the public could be interested in a movement which was so poorly presented. A scrap-book exhibit, such as this was, cannot possibly win the public support, no matter how good the original material might have been. The public must be shown, and shown graphically, by enlarged photographs, interesting models and relief maps, that do not require microscopic texts to enlighten the beholder.



Apartment Houses

Reports for the year show a very large increase in the building of apartment houses, in some places as high as 200 per cent. So large an increase is probably due, not to the building of many apartment houses of the usual class, as to the growing acceptance of the great apartment hotels with the small unit, where the large number of families housed in one building make a large figure in the returns.

The cost of a few rooms equals that of a whole house, a dignified home. But the cost of maintenance, the servant question, and the personal effort make the determining factors. Perhaps it may be easier to limit ones requirements in the smaller spaces.

Sanitation and Vacuum Cleaning

In sympathy with the modern idea of hygienics, the application of the principles embodied in the Suction Cleaner are now recognized throughout the world, not only by the medical fraternity and men of scientific research, but all people possessing common sense and reasonable understanding. The old method of cleaning was simply to displace or remove dirt from one object to another; or, in other words, to stir up the dust in the carpet only to find it again settled upon the furniture. But one result can be obtained from an operation

of that character more dirt. It is stoutly proclaimed by men of understanding that more disease germs enter the human system through inhalation than by any other means. Hence it follows that the more completely we can eradicate and destroy these germs of disease the more sanitary becomes the conditions in which we move and live. The pure food laws have been enacted and are enforced as a means of safeguarding public health, and while we can at once appreciate the virtues of those laws and the necessity of their complete enforcement we can just as readily understand the virtues and the necessity of the purification of the atmosphere which we breathe. Now the logic of the Giant Cleaner is found in this principal fact—it cleans. It does not stir up the dirt and dust in its operation, simply to allow it to settle elsewhere, but it consumes it through the air tube, and all of the dirt, disease germs, fleas and other small insects with which the cleaning tool comes in contact are drawn into the automatic self-cleaner. All of this substance immediately drops to the bottom of the machine and the air is carried away through the exhaust into the chimney or out into the open air. Thus the object is cleaned, the dirt and dust are removed and the air which we breathe is made sanitary and wholesome.

The long looked for problem has been solved, combining the three elements in one machine, i. e. medium, low and high vacuum, which can be positively obtained in the new Giant Model "A." This machine is scientifically constructed, simple in operation and has no wearing parts.

The government specifications for the United States Sub-Treasury building in San Francisco call for 6 inches of mercury, or practically 80 inches of water, which cannot be obtained by a rotary fan type machine; and for a high vacuum machine not to exceed 12 inches of mercury, or 172 inches of water. Either more or less vacuum can be had by our Model "A" air clearing device.

Our own invented propellers, absolutely noiseless, traveling in an inexpensive non-rusting compound, which lasts for years, without any energy on the part of the propellers. This reduces H. P..

This machine can be had motor direct connected or belt driven. The latter being preferred by most users, as the motor can be converted and used to drive laundry machinery, water pumps, or such other machinery as one wishes to operate.

The dirt and dust passes into a receptacle and is separated by a self-cleaner screening device and then lodges in the bottom of receptacle, where there is a pan for same, to be disposed of by the operator.

"Too Busy to Read"

He is a familiar type—the fussy, fretful man who imagines that he is about the busiest fellow in town. He often dumps in the waste-basket, unwrapped, copies of business or technical magazines that contain valuable articles bearing directly on his problems. He fondly believes that he is too busy practising to bother with what others are "preaching."

The trouble with this type of man is that he has not learned that the real executive is the man who so plans his work as to leave a reasonable amount of time for reading and planning.

There are shoals and breakers ahead when the accumulation of new ideas ceases.

The man who declares he has no time to read is unconsciously advertising his small caliber, his slavery to detail, his arrested development.

Rubbing and Polishing Woodwork

In the finishing of new buildings of the better class a serious condition frequently confronts the painter in completing his work in a satisfactory manner—the forcing of the painter to rub and polish work under improper working conditions, when carpenters, plumbers and electricians are yet on their work, with the attending dust and litter and confusion.

The average rubbing and polishing varnish should be used under proper conditions and the painter should be given ample time for his work, as this class of varnishes are usually very slow dryers.

With the rush of the present day methods has come the need for quicker working varnishes and it has been the aim of many makers to achieve the desired results. The drying of any varnish can be hastened by the manufacturer introducing quantities of strong oxides into the oils and the quality of the oils can be cut—both of these methods injuring the elasticity and the durability of the varnish. There are numberless varnish makers, but the number is small who have become recognized as the makers of finishing varnishes. As the recognized leader in the manufacture of piano finishing varnishes, the Boston Varnish Company set to work experimenting along the lines of a quicker rubbing and polishing varnish which would produce the highest class work, but at a price which would still be not greatly above that of the regular grades of rubbing and polishing varnishes. These experiments were started eight years ago and the result of the work—the Boston Varnish Company's "Quick Lac" was placed on the market a little over two years ago.

The result has been accomplished by the manipulation and introduction of a greater amount of certain oils to a given quatity of gum than has been used in the manufacture of any other rubbing and polishing varnish. The quick drying has also been accomplished without the introduction of oxides or rosin into the varnish.

The varnish is said to stand more heat and not soften or print and more cold and not check than any other rubbing and polishing varnish made. The fact that it is dust free in a very short time overcomes the trouble the painter has with dust and dirt settling on the finish. It is supposed to be coated over in 48 hours and rubs bone dry without sweating in three to four days, but in cases where necessary the varnish may be coated over in 24 hours and rubbed in 48 hours, polishing to the highest grade finish.

Portland Architects Will Compete for Fountain

Two Portland architectural firms, Johnson & Mayer and Ellis F. Lawrence, have been invited to compete for the prizes posted by the Detroit City Plan and Improvement Commission for the best plans drawn for the James Scott fountain, to cost $350,000.

The contest has been divided into two stages, the preliminary stage closing April 21. The ten firms whose sketches are adjudged the best will be invited to participate in the second stage, closing June 19.

Three New York firms, generally regarded as among the foremost architects in the United States—Carrere & Hastings, Cass Gilbert & McKim and Mead & White—have been conceded places in the final stage without competition. These firms and the seven others to be selected will be paid for their services regardless of whether they win the first prize. The prizes range from $2000 down to $400.

The Portal of the Palace of Varied Industries

Inspiration of the Work Found in Salamanca Cathedral in Spain.

As one passes through the Fillmore street entrance to the Panama-Pacific International Exposition grounds the eye is immediately attracted and the attention held by the beautiful portal of the Palace of Varied Industries which stands upon the left. It is the first reward for the visitor seeking the wonders suggested by the picture which the pastel-colored exhibit palaces present when seen from the hills of the city above.

But the portal is not a wonder of momentary interest. Visitors who pass it going in are always sure to arrange their tour of the grounds so as to pass it going out. The workmen of the Exposition, sated with the wonders of this great celebration through daily contact, stop on their hurried way to and from work to admire the beauty of this truly palatial entrance. The artists and sculptors of the Exposition, men whose judgment in such matters is of weight, never pass the portal without comment.

The inspiration of the work was the portal of the Salamanca Cathedral in Spain, a structure that furnishes one of the truest examples of the architecture of the Spanish Renaissance still extant. The portal of the Palace of Varied Industries was originally purposed as a replica of the Salamanca portal, but it is more than that. The original is without color save for the monotone of the whole cathedral, while the reproduction is greatly enhanced through the application of the blues and reds and browns of the exposition color scheme to the decorative detail. It differs also from the original

in being somewhat larger and in the fact that the niches are occupied by figures of more modern sculpture in place of the figures of saints common to the ecclesiastical architecture of the Spanish period.

The modern figures completing the portal as well as the alto relief tympanum are the work of Ralph Stackpole, one of the younger of the sculptors who have been engaged from among the country's most celebrated to execute the sculptural decorations of the exposition. The figures are among the most striking and most lifelike, though far from being photographic, to be found about the buildings. The individual figures are all different poses of the same subject—a laborer with a pick. The tympanum consists of a group of five figures representative of as many industries—symbolizing the purpose of the palace itself.

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The Development and Advantage of Cement in California

In a recent conversation with a member of the Board of Supervisors of one of the counties in this State, we were informed that there was required only about 10% of the counties bridge tax, to be used for the repair of existing structures, and the balance of 90% was available for the building of new bridges. This condition exists because this county, some twenty years ago, adopted the policy of building permanent masonry structures, even though their cost was in excess of the other types then in vogue. It was also stated in the conversation that this county has but two more bridges of any importance to construct. They, however, were able to undertake this better than almost any other location in the State, because of the availability of rock in the immediate vicinity that was exceptionally adapted for stone bridges. They also enjoyed the further advantage of having, as its residents, considerable number of skilled Italian stone masons.

At the time this work was undertaken, the merits of reinforced concrete were but meagerly understood, and even though the information at the present day had been available, it would have been prohibitive on account of the great cost of cement, it being then fully two and one-half times as much as at the present time. Through the establishing of the cement factories in this State, there exists today a condition that is placing within the reach of nearly or all of the counties of California, the opportunity to within the next few years accomplish the same result that exists in the county referred to. The great economic value can be better understood, when it is realized that some of our counties are compelled to devote as high as 75% of their bridge taxes toward repairs, and the large majority of them cannot avoid devoting less than 40% toward the maintenance of existing structures.

It is very gratifying to note the large percentage of County Supervisors in this State are coming to a thorough realization of this condition.

The policy of the State Highway Commission, in adopting, so far as possible, the reinforced concrete type of bridge structure is aiding immensely the educational movement toward the securing of permanent structures.

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Saving the Tenant Moving Expense

Every apartment house man, of course, is familiar with the value of "built in furniture" as a renting argument, but the possibilities along this line and the advantages resulting from the owner's standpoint have not been fully appreciated, the writer believes.

With perhaps an exception here and there, built-in furniture, as we understand it today, belongs to this period and this generation; in fact, one might even say, this decade. Few of us can recall any furniture in our mother's home that we might appropriately put into this class. Furniture was then a thing apart and not of the house. Special attention was given to the design and execution of furniture which resulted in the Chippendale, Louis XIV and other periods associated with certain styles of architecture.

Built-in furniture has followed closely the development of bungalow idea. The factor of domestic help has had its influence upon this type of furniture. The lady of the home has been so often thrown upon her own resources of help that she has anticipated this by having every convenience possible built into her home; these conveniences also sometimes help to make life pleasant for the domestics, and hence help to retain their services.

Another factor has been the demand for furnished houses to rent and the consequent wear and tear upon the furniture. Built-in furniture is a saving to the landlord.

Today we have built-in beds, china closets, buffets or sideboards, ironing boards, bread boards, bins and boxes of all sorts, seats and settees, chiffoniers, bookcases, desks and so forth. In fact, after the architect and the cabinet maker have gotten their heads together on built-in furniture there isn't much left for the dealer but a few chairs and a table or two.

Built-in furniture appeals to one because of its fitness. The architect has the designing of it, and it therefore harmonizes with its surroundings, occupying beyond question the very place it should have in the room. It is then finished after the manner of the rest of the room, and the sense of harmony in color treatment is not rudely interrupted by a store piece which is continually swearing at its neighbors.

To the one who has the care of the furniture, the built-in product appeals because it requires less work to keep clean and in place. It is usually more sanitary, being entirely enclosed there is no open space beneath for the accumulation of dust, hairpins and collar buttons.

Built-in furniture is a drawing card to the prospective renter or purchaser, as it means a smaller investment in movable furniture. It should also make available a larger percentage of floor space, an important factor in small apartment houses.

The architect, or the owner, may develop individual ideas in built-in furniture at less expense than he can in movable furniture made by hand after original designs.

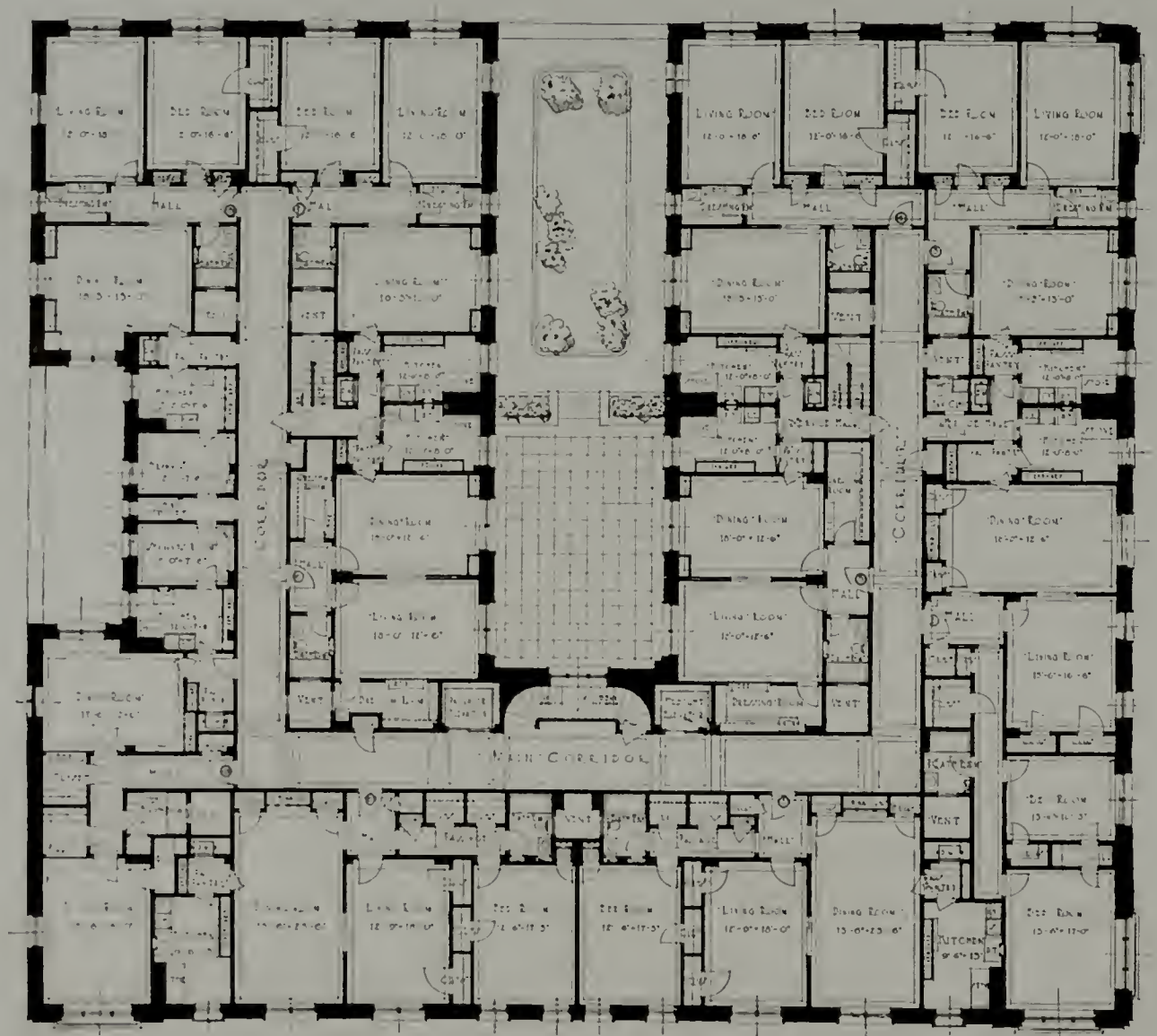
Attractive pieces of built in furniture of an average cost of $50 each, including the glass at $22.00. These were built and finished at the same time and in the same manner as the remaining woodwork of the room. In this particular case, and the feature is applicable to other pieces of furniture, the design and location of lighting fixtures becomes a part of the study

It is a fact experienced by every renter that moving means expense of fitting up the new apartment with proper furniture Often good furniture is stored away because it is not suitable for the particular flat

It would seem logical for the landlord to do as much in the way of "built-in" furniture as possible and charge the tenant a proportionately higher rental for the extras, for in this way complete harmony in the furnishings can be secured.

Warrington Apartments, Schmiedell Estate
Frederick H. Meyer, Architect, San Francisco

Photo, Gabriel Moulin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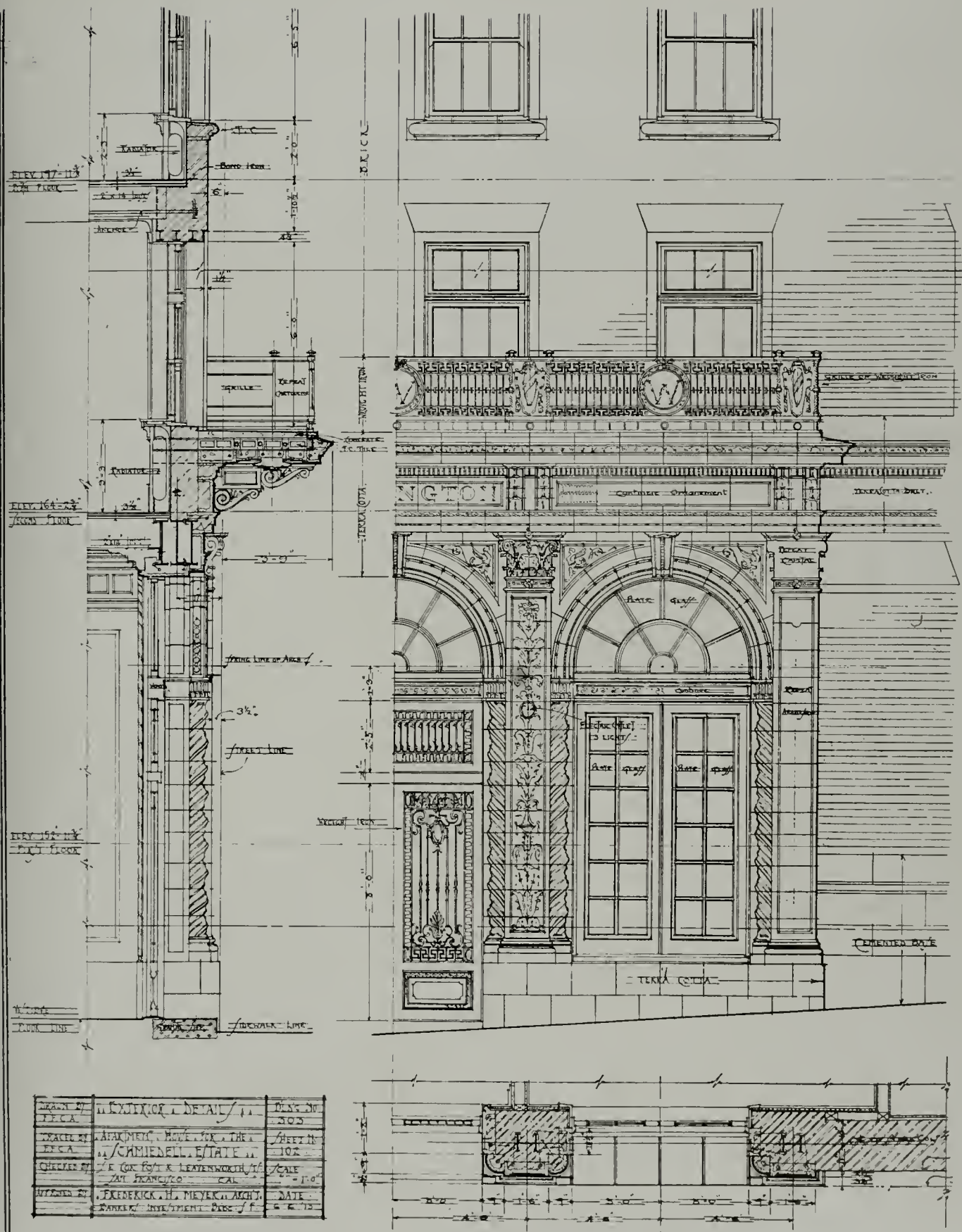
KITCHEN



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APPROVED BY	FREDERICK H. MEYER ARCH'T.	DATE

SECTION THRU FRONT WALL

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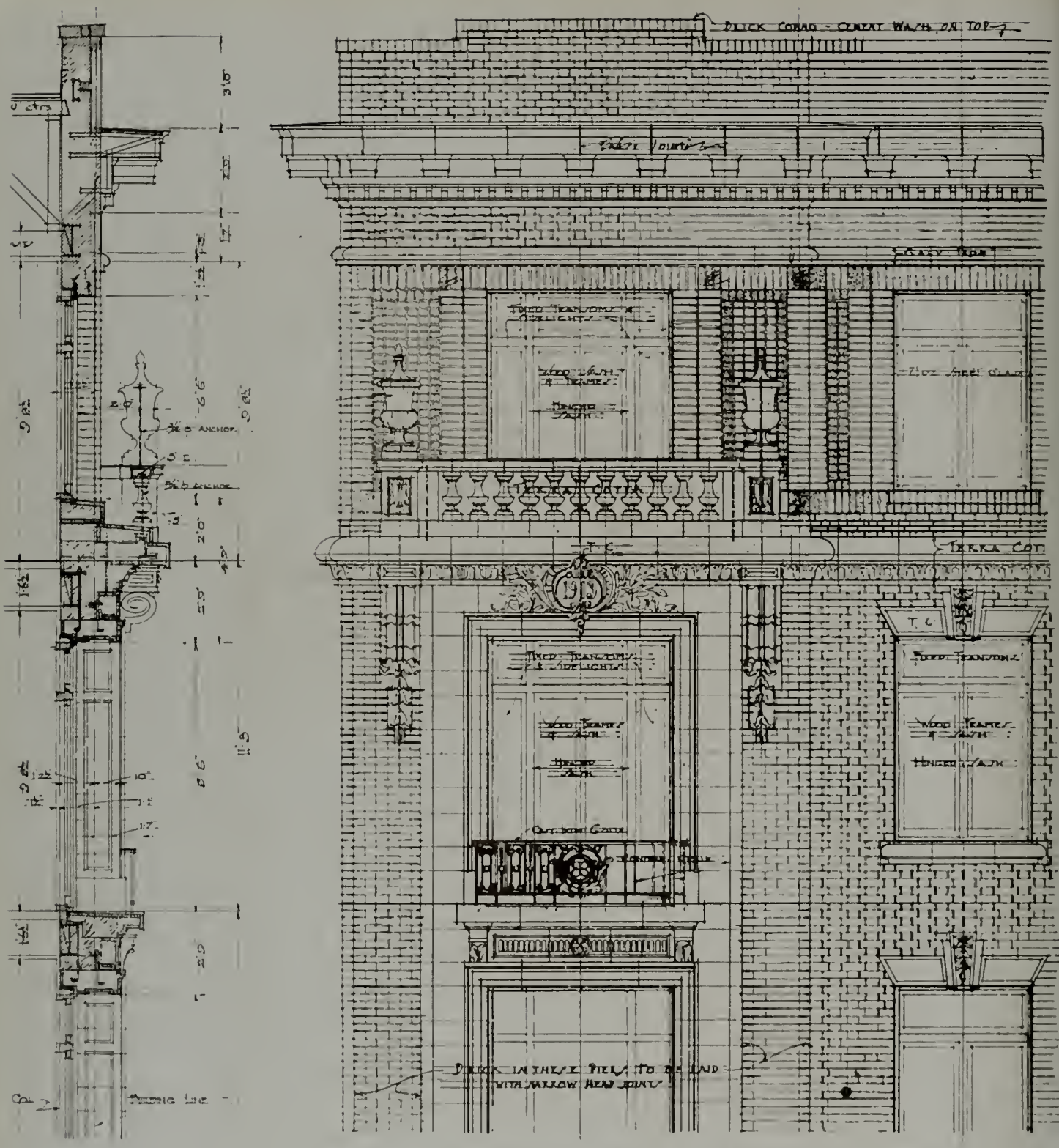
HALF PLAN OF ENTRANCE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TERRA COTTA
TERRA COTTA
BRICK IN THIS PIER TO BE LAID WITH NARROW HEAD JOINT
DETAIL ELEVATION OF UPPER STOR
TYPICAL PLAN FOR SIXTH STORY WINDO

Detail, Belgravia Apartments
Starr & Larsen, Owners
[illegible] H. Meyer, Architect, San Francisco

Typical Floor Plan, Belgravia Apartments

Photo, Gabrigl Moulin

Belgravia Apartments, Sutter and Jones Streets

Starr & Larsen, Owners.

Frederick H. Meyer, Architect, Bankers Investment Bldg., San Francisco

Apartments, 1899 California Street
Sylvain Schnaittacher, Architect, San Francisco, Cal.

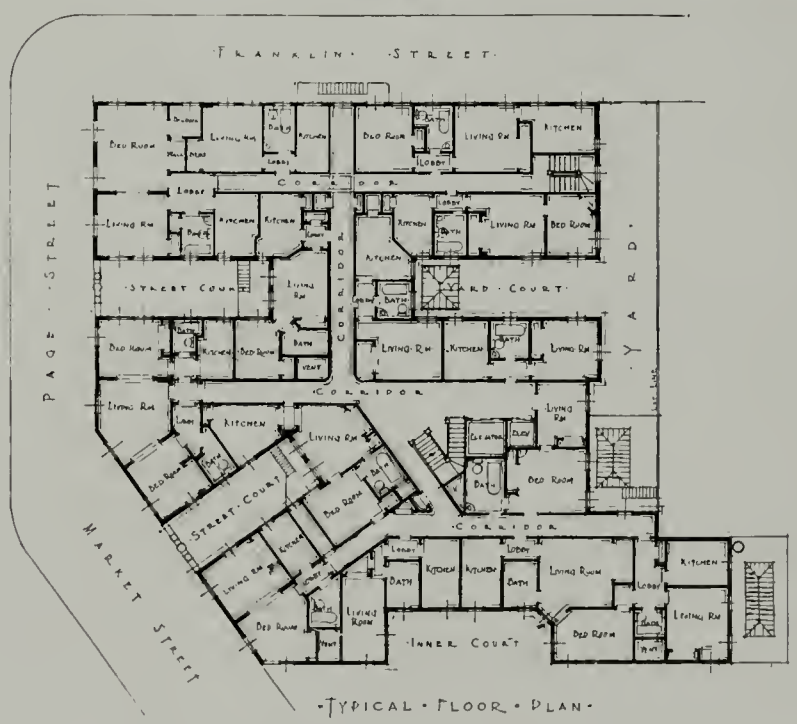
Main Lobby, Apartments, 1899 California Street

Typical Floor Plan, Apartments, 1899 California Street
Sylvain Schnaittacher, Architect, San Francisco, Cal.

Typical Living Room, Apartments, 1899 California Street

Typical Dining Room, Apartments, 1899 California Street
Sylvain Schnaittacher, Architect, San Francisco, Cal.

Raymond Apartments, Market, Page and Franklin Streets
G. Albert Lansburgh, Architect, San Francisco, Cal.



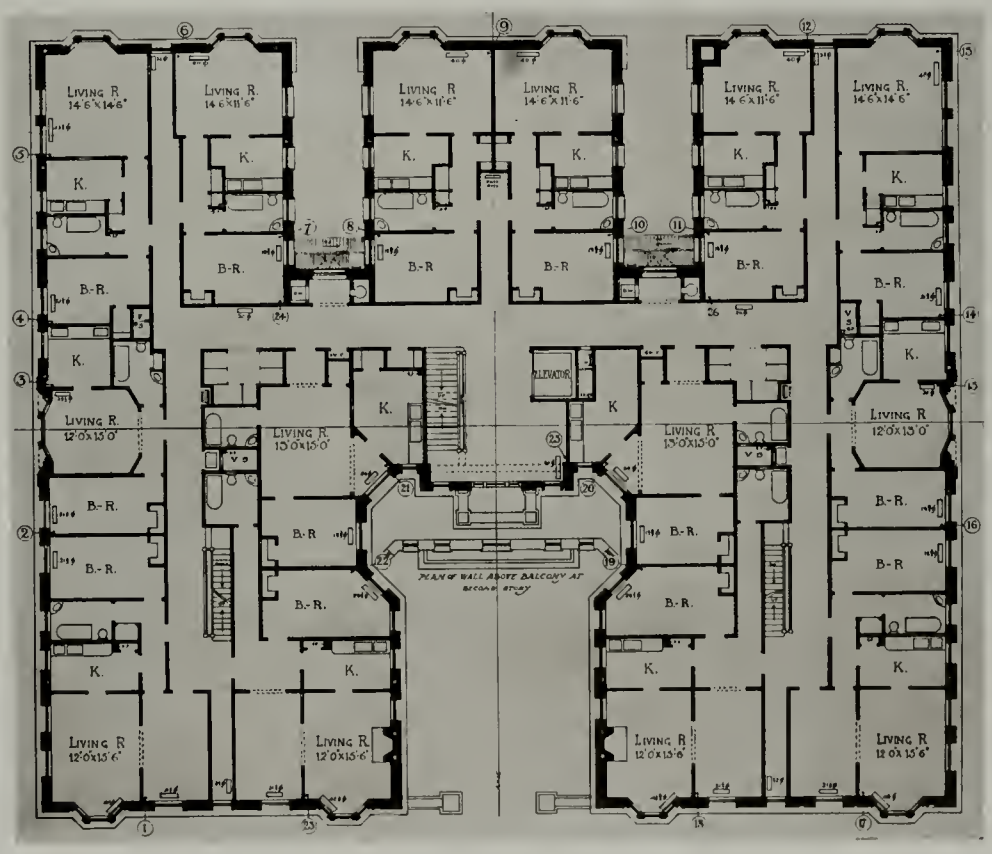
RAYMOND APARTMENTS
PAGE FRANKLIN & MARKET STS
SAN FRANCISCO

MARION LEVENTRITT
OWNER
G. ALBERT LANSBURGH
ARCHITECT

Macbeth Apartments, 745 Geary Street
Charles Peter Weeks, Architect, San Francisco, Cal.
Photo, Gabriel Moulin

San Marice Apartment House, Sutter and Jones Streets
J. R. Miller, Architect, San Francisco, Cal.
Photo, Gabriel Moulin

Holly Lodge Apartments, Vancouver, B. C.



Typical Floor Plan, Holly Lodge Apartments, Vancouver, B. C.
Wright & Rushforth, Architects, San Francisco, Cal.

Henery Apartments, Stockton, California

Lobby, Henery Apartments, Stockton, California

Glenn Allen, Architect, San Francisco, Cal

Hyman Jacobs Apartments, San Francisco
Milton Lichtenstein, Architect, San Francisco, Cal.

Interior Garden, Hyman Jacobs Apartments — Photo, Gabriel Moulin
Milton Lichtenstein, Architect, San Francisco, Cal.

"THE PACIFIC COAST ARCHITECT" is the official organ of the San Francisco Chapter of the American Institute of Architects.

San Francisco Chapter, 1881—President, G. B. McDougall, Russ Building, San Francisco, Cal. Secretary, Sylvain Schnaittacher, First National Bank Building, San Francisco, Cal.
Chairman of Committee on Public Information, William Mooser, Nevada Bank Building.
Chairman of Committee on Competition, Geo. B. McDougall, 235 Montgomery St.
Date of Meetings, third Thursday of every month; annual, October.

OTHER PACIFIC COAST CHAPTERS OF THE AMERICAN INSTITUTE OF ARCHITECTS.

Southern California Chapter, 1894—Vice-President, A. C. Martin, 430 Higgins Bldg., Los Angeles, Cal. Secretary, Fernand Parmentier, Byrne Building, Los Angeles, Cal.
Chairman of Committee on Information, W. C. Pennell, Wright & Callender Bldg., Los Angeles.
Date of Meetings, second Tuesday (except July and August), (Los Angeles).

Oregon Chapter, 1911—President, Morris H. Whitehouse, Wilcox Building, Portland, Ore.
Secretary, Ellis F. Lawrence, Chamber of Commerce Building, Portland, Ore.
Chairman of Committee on Public Information, Ellis F. Lawrence.
Date of Meetings, third Thursday of every month, (Portland); annual, October.

Washington State Chapter, 1894—President, Charles H. Alden, 513 Colman Bldg., Seattle, Wash. Secretary, Arthur L. Loveless, 513 Colman Building, Seattle.
Chairman of Committee on Public Information, Chas. H. Alden, 513 Colman Bldg., Seattle (till further notice send all communications to Arthur L. Loveless, 513 Colman Building, Seattle.)
Date of Meetings, first Wednesday (except July, August and September), (at Seattle except one in spring at Tacoma); annual, November.

Colorado Chapter, 1892—President, Geeorge H. Williamson, 528 Majestic Bldg., Denver, Colo. Secretary, Arthur A. Fisher, 459 Railway Exchange Building, Denver, Colo.
Chairman of Committee on Public Information, Arthur A. Fisher, 459 Railway Exchange Bldg., Denver, Colo.
Date of Meetings, first Monday of every month (Denver, Colo.); annual, September.

THE AMERICAN INSTITUTE OF ARCHITECTS.
The Octagon, Washington, D. C.

OFFICERS FOR 1914.

President ..... R. Clipston Sturgis, Boston, Mass.
First Vice-President ..... Thomas R. Kimbal, Omaha, Neb.
Second Vice-President ..... Frank C. Baldwin, Washington, D. C.
Secretary ..... D. Knickerbacker Boyd, Philadelphia, Pa.
Treasurer ..... John L. Mauran, St. Louis, Mo.

BOARD OF DIRECTORS

For One Year

Irving K. Pond, Steinway Hall, Chicago, Ill.
John M. Donaldson, Penobscot Building, Detroit, Mich.
Edward A. Crane, 1012 Walnut St., Philadelphia, Pa.

For Two Years

Burt L. Fenner, 160 Fifth Ave., New York, N. Y.
C. Grant LaFarge, 25 Madison Sq., N., New York, N. Y.
H. Van Buren Magonigle, 7 West 38th St., New York, N. Y.

For Three Years

Octavius Morgan, 1126 Van Nuys Bldg., Los Angeles, Cal.
W. R. B. Willcox, Central Bldg., Seattle, Wash.
Walter Cook, New York, N. Y.

Auditors

Thomas J. D. Fuller, 806 Seventeenth St., Washington, D. C.
Robert Stead, 906 F Street, Washington, D. C.

SAN FRANCISCO CHAPTER, A. I. A.

The regular monthly meeting of the San Francisco Chapter of the American Institute of Architects was held at the Tait-Zinkand Cafe, on Thursday evening, April 16th, 1914. The meeting was called to order at 8:45 o'clock by Mr. Geo. B. McDougall.

Members present were:

Geo. M. McDougall, President
Edgar A. Mathews, Vice-President
Sylvain Schnaittacher, Secretary
W. B. Faville, H. A. Schulze — Trustees

Applegarth, Geo. A.	McDougall, C.
Barth, Hermann	Mitchell, Wm. Garden
Boese, Frederick D.	Mooser, William
Dickey, Chas. W.	O'Brien, Matthew
Farr, Albert	O'Brien, Smith
Garden, Edw. G.	Politeo, Matthew V.
Hatch, John Davis	Polk, Willis
Headman, August G.	Righetti, Perseo
Joseph, Bernard J.	Smith, Henry C.
Kraft, Edmund	Vogel, E. J.
Lansburgh, G. Albert	Welsh, Thos. J.

and Mr. St. John McCormick was a guest of the Chapter.

MINUTES.

The minutes of the regular meeting of March 19th, 1914 were read and approved.

STANDING COMMITTEES.

None of the Standing Committees had anything to report, with the exception of the Educational Committee on Practice. Mr. Smith O'Brien, for this committee, reported that an interesting paper was under consideration for the next meeting. Mr. St. John McCormick, under the auspices of this committee, before the business meeting, read a most interesting paper on "Manufacturing of Ornamental Bronze and Iron Work," and at the conclusion of the reading was tendered the thanks of the Chapter.

SPECIAL COMMITTEES.

There were no reports from the Special Committees.

COMMUNICATIONS.

The following communications were received and ordered placed on file:

Pamphlets in reference to Fire Protection to be distributed to all the non-institute members of the San Francisco Chapter; from Webster Tomlinson, Secretary of the Illinois Chapter, A. I. A., *in re* classification of membership in the Chapters, and the extending of an invitation to all Chapter members to attend the regular monthly meeting and informal dinner to be held on the evening of May 7th; from the Chairman of the Committee on Institute Membership, A. I. A., referring to the increasing of Institute membership in the Chapters. Minutes of the annual meeting of the Michigan Chapter, A. I. A.; and letter of acknowledgment from the Secretary of the Southern California Chapter, A. I. A., *in re* our letter of condolence at the death of Mr. R. B. Young. Letters from Senators Geo. C. Perkins and John D. Works, and from Representatives Jules Kahn, John E. Raker, John I. Nolan, W. D. Stephens and J. R. Knowland, acknowledging our letter of protest against the destruction of the army barracks at New Orleans and signifying their willingness to help save the above mentioned buildings; from the Citizens' Committee of One Hundred, referring to the development and beautification of the National Capitol, with enclosed pamphlet; from Pond & Pond, architects of Chicago, copy of letter sent to Mr. Greenwood, President of the San Francisco Architectural Club, stating his approval in the matter of the above mentioned body holding a National Architectural Exhibition in San Francisco during 1915; from Mr. G. Alexander Wright, S. F. Chapter, A. I. A., a circular of advice of the Royal Institute of British Architects between the Architect and the Client; from the General Contractors' Association, informing the profession that the contractors are in a position to figure contracts on the entire contruction of buildings, etc.; a copy of the "Quantity Surveyor" for April; and communication from John Reid, Jr., Letter from the Secretary of the National Conference on City Planning, requesting a representative of the San Francisco Chapter at the meeting to be held in Toronto; and letter from C. H. Whitaker, Acting Executive Secretary, A. I. A.

UNFINISHED BUSINESS.

There was no unfinished business.

NEW BUSINESS.

The following resolution offered by the Board of Directors was read by the Secretary: "*Resolved*, That in the interest of the Institute, all minutes and proceedings in the matter of the charges and trial of three of its members are hereby expunged from the records." Mr. Geo. B. McDougall, Edgar A. Mathews and Henry

A. Schulze spoke in support of the resolution. On motion duly made and seconded the resolution was carried unanimously.

The Board of Directors were authorized to arrange for a dinner of appropriate dignity in honor of the Honorable James D. Phelan, and Messrs. Cass Gilbert and Paul Cret, on the evening of May 5th, 1914.

It was also moved, seconded and carried that suitable entertainment be arranged upon the arrival of President MacLaren of the Massachusetts Institute of Technology.

The form letter of the R. I. B. A., a copy of which was sent to the Chapter by Mr. G. Alexander Wright, was reread upon request, and the Secretary directed to include a copy of the same with the next minutes.

ADJOURNMENT.

There being no further business before the Chapter, the meeting adjourned at 10:20 o'clock.

Subject to approval,

SYLVAIN SCHNAITTACHER,
Secretary.

The following is a copy of a form letter suggested by the R. I. B. A. and which was presented to the Chapter by Mr. G. Alexander Wright:

Address .....

Date .....

DEAR SIR:

NAME OF WORK.

With reference to this (Insert here name of work) which you have been so good as to entrust to me I enclose the Conditions of Engagement and Scale of Charges sanctioned by the Royal Institute of British Architects, of which I am a (Insert here fellow, associate, or licentiate). As my work as Architect will in all probability extend from first to last over twelve months, a written memorandum with regard to my remuneration is desirable in the interests of both of us.

Will you kindly peruse the enclosure and if it is satisfactory to you will you kindly send me a letter signifying your assent to its terms? If you find anything which requires further explanation please let me know and I shall be happy to discuss it with you.

Yours faithfully,

To .....

Mem.: The reply from the Client should state, expressly or in effect, that he engages the Architect for the stated work upon the terms of the Conditions of Engagement and Scale of Charges.

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SOUTHERN CALIFORNIA CHAPTER, A. I. A.

The seventy first meeting of the Southern California Chapter of the American Institute of Architects was held at the Hollenbeck Cafe, Los Angeles, Cal., on Tuesday, April 14, 1914. The meeting was called to order at 8 p. m. by Vice President A. C. Martin. The following members were present.

1	A. L. Acker	16	A. C. Martin
2	D. C. Allison	17	H. H. Martin
3	J. E. Allison	18	B. M. Morris
4	Theo. A. Eisen	19	O. W. Morgan
5	A. M. Edelman	20	Robert H. Orr
6	W. E. Erkes	21	Fernand Parmentier
7	Lyman Farwell	22	A. F. Rosenheim
8	Irving J. Gill	23	F. L. Stiff
9	Homer W. Gludden	24	P. J. Van Trees
10	W. S. Hebbard	25	J. T. Vawter
11	John C. Hillman	26	Aug. Wackerbarth
12	Sumner P. Hunt	27	H. F. Withey
13	Frank D. Hudson	28	F. R. Schaefer
14	J. W. Krause	29	Wm. Henry Wilson
15	John P. Krempel	30	John W. Mitchell

As guests of the Chapter were present the following members of the Northern Division of the California State Board of Architecture: Geo. B. McDougall, Sylvain Schnaittacher and John Bakewell, Jr., Charles Gordon, a local architect, and Meyer Lissner, a local attorney. Harry Iles and John D. Bowler of the Builder and Contractor, Wm. E. Prine and H. K. Housley of the Southwest Contractor.

As Mr. Meyer Lissner had been invited by the Entertainment Committee of the Chapter to address the members on his recent European journey, and as his time for the evening was limited, the Chairman announced the deviation of the regular order of business and called upon Mr. Lissner to deliver his address. This proved of a highly interesting character, and was illustrated by stereopticon views of interesting examples of European architecture and scenery. At the close of the address, Mr. Lissner was tendered the Chapter's hearty vote of thanks.

At 9 p. m. the regular order of business of the meeting proceeded with the reading of the minutes of the seventieth meeting of members, and the adoption of same.

For the Committee on Civic Improvements, A. F. Rosenheim reported that the committee had agreed on a resolution to be presented to the Los Angeles City Council, and that a subsequent report to the Chapter would follow.

For the Chapter's Committee on Entertainment, John P. Krempel reported that Mr. A. M. Edelman would in the near future address the Chapter members with an illustrated talk on his recent European travels.

For the Sub Committee on Education, H. F. Withey reported the approval of a program for a Student's Competition for the improvement of four corners formed by two intersecting streets.

Correspondences were next read as follows:

From R. H. Forbes, Director of the Agricultural Experimental Station, University of Arizona, in answer to a communication from this Chapter in explanation of a circular sent out to the Chapter members, referring to competition for plans for an agricultural building for the University.

From the American Federation of Arts, calling attention to the Convention of the American Federation of Arts to be held in Chicago, May 21st to 23rd, 1914.

From C. H. Whitaker, acting Executive Secretary of the Institute, in answer to an inquiry from this Chapter with reference to methods of procedure in the case of a death of a Chapter president.

From United States Senator Geo. C. Perkins, acknowledging receipt of a communication from this Chapter *in re* Jackson Barracks, New Orleans, and Forestry Survey, and report on land adjacent to the District of Columbia for a Forest Park. Senator Perkins promised his co-operation in this matter.

Replies on the same subject were also read from Senator John D. Works, and members of the House of Representatives, Wm. Kettner and Wm. E. Stephens, who all promised their hearty co-operation.

From the Building Ordinance Commission of the City of Los Angeles, requesting from the members of this Chapter any recommendation or suggestions they may have to offer toward the revision of the Los Angeles City Building Ordinances.

From Mr. L. C. Vinson, submitting to the Chapter a proposition *in re* the position of a permanent manager of the Architectural League of the Pacific Coast, and incidentally outlining a program for the financing and general conducting of architectural exhibitions.

Mr. Sylvain Schnaittacher, Secretary of the San Francisco Chapter, A. I. A., rose to explain certain statements contained in Mr. Vinson's letter concerning the attitude of the San Francisco Chapter. The San Francisco Chapter, A. I. A., had not promised definite support to Mr. Vinson's proposition, owing to the fact that it had promised its patronage toward an exhibit to be produced by the San Francisco Architectural Club after the Fair, avoiding conflict with the Architectural Exhibit that is to take place simultaneously with the Fair of 1915.

A discussion followed resulting in a motion made and seconded to file the communication, to which H. F. Withey, seconded by A. F. Rosenheim, offered an amendment to have a committee appointed to report at the following Chapter meeting. The original motion to file the communication was carried.

The next communication was from the Los Angeles Chamber of Mines and Oil, calling the Chapter members' attention to offices for rent in the new Knickerbocker building.

From the A. I. A. Committee on Institute Membership, submitting to the Chapter a systematized plan to increase its Institute membership. The Chairman announced that he would appoint a committee to report on the matter at the following meeting.

From the Illinois Chapter, A. I. A., inviting the members of this Chapter to attend a regular meeting of the Illinois Chapter on the evening of Thursday, May 7, 1914.

From the San Francisco Chapter, A. I. A., expressing the sympathy over the demise of the late President of this Chapter, Robert B. Young.

From Mr. Meyer Lissner, accepting the Chapter's invitation to be present at this meeting.

From the Los Angeles Municipal League, requesting the members of this Chapter to act as a special committee to aid in explaining the various sections of the present City Planning Exhibit.

From the National Conference on City Planning extending an invitation to this Chapter to be represented at the National Conference on City Planning, which meets this year in Toronto.

From J. Cather Newsom, member of the Northern District of the State Board of Architecture, expressing his regret at not being able to be present at this Chapter meeting.

From A. F. Rosenheim, enclosing a revised form of the resolutions on the death of R. B. Young, President of this Chapter with request to have the same as revised spread upon the Chapter minutes.

From G. Alexander Wright, member San Francisco Chapter A. I. A., requesting the Chapter's subscription to "The Quantity Surveyor."

The matter of the standard specifications for painting, as compiled by the Master House Painters and Decorators Association of Los Angeles, Cal., was next taken up. A. F. Rosenheim, Chairman of the committee appointed to pass upon these specifications, recommended their adoption to the Chapter. A general discussion followed. F. D. Hudson, moved, seconded by J. W. Krause, to adopt the general conditions of the specifications. F. Parmentier proposed for the Chapter to give its present endorsement to the form of specifications, reserving a final adoption until such time that the members of the Chapter could thoroughly discuss the points involved. After further discussion, F. D. Hudson moved, seconded by J. W. Krause that the Chapter accept the committee's report and approve the specifications, and allow the members to take advantage of the clauses contained therein. This motion was carried and the Secretary instructed to notify the Master Painters Association to that effect.

The Secretary next announced the receipt of A. I. A. documents numbers 100, 101, 102, 103 and 104, the latter document being the new revision of the Institute's constitution and by-laws.

The Chairman next spoke of the present City Planning Exhibit held at the Bronson Building, and invited the members present to send in some of their drawings to supplement the planning exhibit.

H. F. Withey next read a newspaper article concerning the Los Angeles Chief of Fire Department's recommendation to the Los Angeles City Council for certain form of fire stairs to buildings. After a short discussion, the Chairman referred the matter to the Chapter's permanent committee on legislation.

The Chairman next called on Mr. Geo. B. McDougall, President of the San Francisco Chapter, A. I. A., and member of the State Board of Architecture, who addressed the members. He was followed by John Bakewell, Jr., Vice-President of the Architectural League of the Pacific Coast, and Sylvain Schnaittacher, Secretary of the San Francisco Chapter, A. I. A., and of the State Board of Architecture.

J. E. Allison suggested that the members of this Chapter meet at the City Planning Exhibit being held at the Bronson building during some evening the coming week. After discussion, the Secretary was instructed to notify the members by postal to meet at the Exhibit on Friday evening, April 17th, 1914, on motion made by A. F. Rosenheim, seconded and duly carried.

The meeting adjourned at 10:50 p. m.

FERNAND PARMENTIER,
Secretary.

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OREGON CHAPTER, A. I. A.

Meeting, held March 19, 1914, at the Commercial Club, was called to order by President Whitehouse.

The following members answered the roll call: Messrs. Naramore, Johnson, Whitehouse, Smith, Williams, Fouilhoux, Holford and Wilson.

In the absence of the Secretary, Mr. Holford was appointed to serve as Temporary Secretary.

It was moved and seconded that the minutes of the last meeting be accepted as printed.

Reports of Standing Committees

Committee on Legislation reported as follows:

The undersigned, Chairman of your Legislative Committee, begs leave at this time to call your attention to the decision recently rendered in the Circuit Court in the case of the City vs. the Smith Hotel Co., referred to in my last communication to you, involving the interpretation to be placed on Sections 341 and 458 of the City Building Code, in which Judge McGinn held that the two sections were conflicting and dismissed the suit, advising the Building Inspector that it was up to his department to so amend the Code as to prevent any conflicting requirements in same.

Your attention is also called to a decision of the Circuit Court in the case of the City vs. Arbuckle & Ray, involving the condemnation of certain buildings, in which Judge Harris held that "The ordinance was invalid principally because of the arbitrary provision that all buildings more than 40 per cent depreciated and beyond the possibility of repair may be condemned without the opportunity to the owners that the building is not dangerous or unsafe and because of the unreasonable power bestowed on the building inspector." Judge Harris went on further to say that "When the manner by which a city may exercise a power is not provided, the city may prescribe the methods of exercising such designated power, but must keep within the bounds of reason. The fiat of the City Council declaring all buildings depreciated 40 per cent to be dangerous and unsafe is a doubtful doctrine. Such danger should be established at a trial. There is no doubt but that cities have the right to prevent it to remove a nuisance and to prescribe the manner of removal, provided the nuisance exists, either by common law, by statute or in fact, but the exercise of authority must be used within reason."

The City Building Code contains four conflicting sections (494-495 501 and 526) regarding the condemnation and removal of depreciated buildings. Sections 494 and 495 make it mandatory for an owner to repair a depreciated building, if possible, whilst Sections 501 and 526 provide certain authority to the Building Inspector to compel the removal of same. This mix up in the Code was occasioned by mixing up the provisions of the Building Code of the City of Cleveland, Ohio, and that of the provisions of previous ordinances of the City of Portland in compiling the present Building Code without proper attention being paid to the conflicting provisions of the two. The City of Cleveland Code reading the same as Section 494 and 495, except that paragraph (b) of Section 723 of the Cleveland Code provided that "(b) Those which, exclusive of the foundation, show thirty-three (33) per cent of damage or deterioration *of the supporting members of members*, or fifty (50) per cent of damage or deterioration of the non-supporting enclosing walls of covering," and Section 724 reads: "All defective or dangerous buildings *shall be repaired and put in safe* condition at once, or if the deterioration is of greater per cent than given under Section 723 *beyond the possibility of repair*, then they shall be entirely removed."

In connection with the above, your attention is called to Ordinance No. 19,170, in force prior to the present Code, in which paragraph 7-(b) provided that "Any building which has been taken down for more than one-half of its cubical extent, and re-erected, wholly or partially," should be considered a "new building," cubical extent being defined in paragraph 16 as "The space in a building contained within the external surfaces of its walls and roof and the upper surface of the floor of its lowest story."

Section 501 of the Code explicitly limits arbitration "to the amount of damage caused by fire," whereas the Building Inspector has tried to enforce arbitration on damage and depreciation other than that caused by fire.

The decisions of the Board of Appeals should be made known to the members of this Chapter directly following the same by the said Board, either by copies being mailed to the members of the Chapter or by publication in the "Oregon Building Record," to the end that each and every member of the Chapter may be conversant with all decisions affecting the interpretation to be placed on different sections of the Code."

Mr. Wilson moved, and Mr. Naramore seconded, that the report be accepted. Motion carried.

Chairman of Committee on Building Laws was instructed to request the Board of Appeal to furnish a copy of all decisions to the Secretary of the Chapter. The Secretary was instructed to furnish all members with a copy of these decisions.

Committee on Building Laws reported as follows:

Since the last report we had two meetings of the Committee on Building Code Revision. The committee recommended that the wording of Section 458 of the present Building Code be changed as follows:

A roof, the slope of which is not more than three (3) inches per foot horizontal, and the covering of which is made with a composition of felt and gravel, shall be considered *to have an* incombustible *roofing* under the provisions of this Code, and *this roofing* may be used upon buildings of all classes, provided that such roofing is not less than four (4) ply for all buildings better than the sixth class.

Regarding the question of certificate of final inspection by the Building Inspector, the committee recommended that Section 14 and Section 51 be combined in one section, to read as follows:

"The Inspector of Buildings shall, during construction, regularly inspect, or cause to be inspected, all buildings, for the purpose of ascertaining that they are being constructed in conformity to the provisions of the ordinance of the City of Portland, and if any violation is found to exist said Inspector shall immediately order the owner or other persons in charge to proceed with such changes or alterations to make said building conform to said ordinances. When notified by the owner or other persons in charge of the completion of said building, he shall make inspection and examination of such building and issue a certificate that it has been found to be constructed in conformity to the provisions and the ordinances of the City of Portland."

Mr. Hogue, a member of our committee, suggested several changes in the present Code regarding reinforced concrete structures. This was referred to Mr. Naramore, who in his capacity of member of the Code Revision Committee at the City Hall has already looked into this matter. Several of the changes suggested by Mr. Hogue have already been incorporated in the proposed new building ordinance.

Mr. Wilson moved, and Mr. Johnson seconded, that report be accepted with changing in wording of definition of roof as follows:

"A roof, the slope of which is not more than three (3) inches per foot horizontal, and the covering of which is made with a composition of felt and gravel, shall be considered *to have an* incombustible *roofing* under the provisions of this Code, and *this roofing* may be used upon buildings of all classes, provided that such roofing is not less than four (4) ply for all buildings better than the sixth class."

Motion carried.

Committee on Membership—Mr. Wilson was instructed to submit a report on Junior Membership.

Committee on Competitions—No report.

Committee on Municipal Plans and Affairs—No report.

Committee on Education reported as follows:

"Your committee has no activities to report during the past month other than the regular Beaux Arts work in the Atelier.

Six students took the last esquisse—four order problems and two plan. There should have been more. Your committee urges the Chapter members to use every opportunity to impress on their draftsmen the advantages of doing this work.

The Club, as you probably know, moved the 1st of the month to 320 Worcester Building, where comfortable rooms, with heat and janitor's service included, have been rented. This change, giving us heat and janitor's service, removes one of the objections that the students had to the old quarters, and it is to be hoped that all students will now work in the Club quarters."

Report ordered filed.

Committee on Entertainment—No report.

Committee on Quantity Survey reported as follows:

"Active work on the matter of the Quantity Survey is awaiting the action of the Builders' Exchange. As previously reported, the matter was taken up with the Exchange before its February meeting, but on account of press of business they were not able to consider the matter.

At the March meeting the time was taken up considering the question of the affiliation with the National Association of Exchanges and the adoption of a uniform contract, and the Quantity Survey was again postponed. It is probably best to have their action before going further."

Committee on Rose Festival—No report.

READING OF COMMUNICATIONS

Letters from Charles Swartout in regard to Mr. Chamberlain's bill for relieving the pressure of work on the Supervising Architect's office and requesting on behalf of President Sturgis that no action be taken on matters pertaining to Government architecture until proposed action had been brought for approval before the Committee on Government Architecture and the Board of Directors.

Letters from Mr. Medary asking for an expression of opinion from the Chapter on the Circular of Advice and Competition Code.

Letter from E. F. Lawrence to Mr. Medary expressing his opinion of the Code as a member of the Committee on Competitions.

Mr. Wilson moved, and Mr. Foulhoux seconded, that the Secretary be instructed to write Mr. Medary that the Chapter favored competitions for all public buildings costing over a certain amount. Motion carried.

NEW BUSINESS

Mr. Naramore moved, and Mr. Foulhoux seconded, that the Executive Committee be empowered to order the printing of the Constitution, etc., at its discretion. Motion carried.

Mr. Williams moved, and Mr. Wilson seconded, that the Municipal Plans and Affairs Committee look into the design of the county bridges and report its findings to the Chapter. Motion carried.

Mr. Mayer, Chairman Competition Committee, was instructed to write to Marshfield in regard to the proposed competition for a gymnasium.

Mr. Wilson moved, and Mr. Foulhoux seconded, that the applications for Institute membership favorably passed upon by the Institute members of the Chapter, received from Messrs. Joseph Jacobberger, D. C. Lewis, W. G. Holford, V. E. Doyle, F. V. Naramore and W. C. Knighton, be unanimously approved by the Chapter. Motion carried.

The following proposal was received from L. C. Vinson.

"I should like to submit to you for your endorsement a proposition in re the managership of the Architectural League of the Pacific Coast.

"The work that would come under the above heading I would divide into three sections. First, the exhibitions; second, the publication of the catalogue; and third, educational work in the interests of good architecture.

"My plan in regard to the exhibitions is to keep them of comparatively small size, not over six hundred items. Half of these would represent the very best work done in the respective cities, and form a number which would travel from city to city, and there be supplemented by local work. It would also be my plan to invite one distinguished painter and one mural painter or interior decorator from the East to make a special exhibit with the League.

"The advantage of having a permanent manager in charge of these exhibitions is obvious in that he would have increased experience each year in securing greater publicity and interested attendance.

"The catalogue [illegible] I would prefer to call it, the Annual would be very much larger than those published by the various architectural leagues. It would be larger than that of the Architectural League of New York. In the matter of illustrations, I should suggest that there be a committee in each of the four cities, and sub-committees in the more prominent of the smaller cities, such as Spokane, San Diego, etc., who would select the very best work done during the year, and furthermore illustrate that work in regard to plan and detail as completely as possible.

"Of course, this could be supplemented by sketches and individual photographs of interiors, sculpture, etc., if desirable. This would mean that the architects of the Pacific Coast would have a representative organ, which it now has not, with a definite circulation throughout the country. I should expect to sell this for $2 or $3, probably $3. In publishing an Annual of this character, it would serve to take the method of advertising from its present contribution or hold-up method of soliciting and place it purely on a business basis, where the advertiser would get value received for the money spent in advertising, and it also would not only command the support of the material men and contractors of the Coast, but also the large general advertisers of building material throughout the country.

"I would expect to charge $100 per page for advertising. I feel that the total income the first year from the sale of the Annual, advertising and exhibit spaces of building material at the exhibition would be at least from $12,000 to $15,000 if not more.

"Under the head of educational work I would first arrange a small exhibition of possibly two hundred entries, very carefully selected, and lightly framed, which could be sent to all of the small towns of the Coast, wherever any club or organization would be willing to pay the express. Along with these smaller exhibitions I should want to send one or two lectures, together with lantern slides, which could be read during the course of the exhibition. I should also have prepared special newspaper write-ups, together with half tones, so that the fullest publicity could be obtained.

"Another plan would be a collection of the most representative school work done in this country, which could be sent on request to any Board of Education in any of the small towns of the interior where they contemplate building. This would serve to give them a standard to start their own work and compare any plans that they might receive. A paper should be with this exhibit, bringing out the necessity and value of having good architects on all public work, especially in the matter of school buildings. This idea could be carried out along several different lines.

"Another idea which a manager could develop to advantage is a plan that the Colorado State Chapter is following in Denver. In that city they found that a very small portion of the building permits were passed through the architects' offices. So they have started a series of paid newspaper advertisements on the value and necessity of employing an architect in preference to allowing buildings to be handled solely by the contractor or real estate man.

"The above are merely a few of the details which a permanent manager could handle and develop. For the above work I should expect a salary of $2500 a year. This should be absolutely clear. The A. L. P. C. would be expected to stand all expenses connected with the work as outlined above, as well as whatever traveling expenses should be necessary. Also my traveling expenses from Cleveland to the Coast.

"To finance the exhibition until funds were available from advertising, which would not be until about five months from the time the work started, I would suggest that five or six in each of the four cities who are members of the A. L. P. C. loan the Architectural League of the Pacific Coast $100 apiece for that length of time. This, of course, would be returned as soon as funds commenced to come in from the advertising.

"The Executive Committee of the San Francisco Chapter of the A. L. A. has endorsed the above proposition and it will come up for Chapter endorsement at the next meeting the fore part of April.

"If it is desired to hold the first exhibition at the time of the Convention in Seattle, the middle of September, immediate action is requisite."

It was moved by Mr. Williams, and seconded by Mr. Wilson, that the Secretary endorse Mr. Vinson's letter and that the Secretary be instructed to so notify President Carl Gould of the Architectural League of the Pacific Coast.

There being no further business, meeting adjourned.

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Throop College of Technology, Pasadena, California, is presenting a program of competition with cash prizes for a scheme of development for "Four Corners." Judgment is to be rendered by a jury of three chosen from the membership of the Southern California Chapter of the American Institute of Architects. The award will be announced on or before September 10, 1914.

Three prizes will be awarded, the first of $200.00, the second of $100.00, and the third of $50.00, and honorable mention may be made as determined by the jury.

Inquiries for further information should be addressed in writing to "Four Corners Competition," Throop College of Technology, Pasadena, Cal.

Work of Present Day Sculptors

Hundreds of striking groups of sculpture and single pieces now in San Francisco for the Panama-Pacific International Exposition next year reveal the plastic art at the very highest stage of its development. Many of these figures have already been enlarged by the pantograph and soon will be placed in position in the exposition courts or upon the vast exhibit palaces.

The placing of the various monumental figures has not been left until the last minute. More than two score of the famous sculptors of the day were early assigned their work which, in each case, bears a special relation to the vast court or exhibit palace which it will ornament.

The plan of the sculpture for the exposition is designed to form a sequence from the first piece that greets the visitor on his entrance from San Francisco on the south throughout the five courts and the circuit of the enclosing walls. Entering from the city through the south gardens, between Festival Hall and the Palace of Horticulture, the visitor will first be confronted with a great equestrian fountain symbolizing the creation of the Isthmian Waterway between the oceans—The Fountain of Energy.

This figure gives the keynote of the exposition statuary. When the notable sculptors to whom were entrusted the sculptural designs began their work they had, as an inspiration a task that has appealed to the

"THE MINER," figure for niches in the east walls of the Palaces of Varied Industries, and of Mines and Metallurgy. This figure is the work of Albert Weinert, a well-known German-American sculptor.

world for centuries. In the opening of the Panama canal they saw the final result of more than four centuries of effort to get a passage way between the oceans. And so, at San Francisco, figures of the early explorers of the oceans, of the pioneers who first blazed trails across the American continents to the shores of the Pacific Ocean, groups symbolizing the Orient and the Occident are frequently produced. Not all of the statuary, however, touches upon the theme of the exposition in its celebration of the opening of the Panama canal. Many of the groups and figures are purely fanciful or allegorical, for the sculptors ransacked history, both ancient and modern, for their conceptions.

"THE FOUNTAIN OF CERES," by Evelyn Beatrice Longman, for the center of the Court of the Four Seasons. Upon the tip of a globe surmounting the pedestal, the figure of Ceres is poised, as though new-lighted from flight. In one hand the goddess bears a wreath of wheat, and in the other a stalk of American maize in full ear. Around the pedestal is a frieze of graceful dancing female figures in flowing draperies, bearing in their arms wreaths, and baskets full of the products of the soil. In finish and delicacy this fountain is very characteristic of the work of Miss Longman, who is a well-known American artist, a member of the National Sculpture Society, and of the National Academy of Design.

The Fountain of Energy will be outlined against the lofty opening of the archway of the tower gate, the superb Tower of Jewels which commands the south entrance of the main court of the exposition, the Court of the Universe. The archway is 125 feet in height and will form the framing of the Fountain of Energy which is achieved as an imaginative equestrian group representing energy—The Victor.

The figure of a splendid nude youth, mounted upon a spirited horse, is depicted as advancing steadily through the waters of the passage; his arms are out-

stretched as if pushing the land apart and making way for the Panama canal, while the attendant figures of Valor and Fame form an encircling crest above his stern head. Water flows down the four sides of the pedestal upon which are shown the figures of laborers, the human bulwarks of the canal.

Passing beneath the archway, after viewing the monument, and entering the Court of the Universe (designed by Messrs. McKim, Mead and White of New York), beneath the great friezes of color below the soffits of the arches, the visitor arrives in a vast oval courtyard around which colonnades sweep to the right and the left. On the central axis in these directions are the triumphal arches 160 feet high, the crowning groups

The two main free standing monuments of the Court of the Universe are the Fountains of the Rising and of the Setting Sun, occupying positions relatively east and west. The upper portions of these fountains are to be the sources of the light illumination of the court. Great globes surmounted by figures representing a sunburst and sunset, typifying the rising and the setting sun, give forth at night an incandescent glow, while below in the basins reclining figures of the planets surmount globes of light behind which the water will fall in screens. These fountains are being executed by Adolph A. Weinman of New York City, who has already been identified with much work connected with the firm of McKim, Mead and White.

"PANEL" representing Greek Culture, by Bruno L. Zimm, sculptor, for use upon the dome of the rotunda of the Palace of Fine Arts This is one of the three panels which are intended to symbolize the striving of art after the unattainable, which are to be placed ninety feet in the air, above the mirroring waters of the Fine Arts lagoon.

of which represent "The Nations of the East" and "The Nations of the West," groups which have attracted wide attention. The groups replace the form of the old Roman quadriga; and are original inventions of monumental composition and rich treatment, they are the collaborative work of A. Stirling Calder, Frederick G. R. Roth and Leo Lentelli. The group, "The Nations of the East," of which the central figure is a great elephant flanked by figures of camel riders, arab warriors, slaves, priests and falconers is particularly striking and imaginative.

Flanking the main axis of circulation of the court north and south, at the level of descent into a sunken garden in the center of the court in which are placed the fountains of the Rising and the Setting Sun, titanic figures in horizontal compositions, of the four elements: Fire, Water, Earth and Air are designed. These, of a great scale and placed close to the ground have given a most symbolically imaginative rendering, and are of especial interest. Mr. Robert I. Aitken, originally of San Francisco, but now of New York, designed and executed the figures. On the upper ramps of the

sunken garden in positions in front of the arches, will be two vertical groups of two figures each, representing "Order and Chaos" and "Eternity and Change," designed by Paul Manship. The exact center of the court will be marked by a group by D. C. French.

Encircling the Court of the Universe will be a lofty colonnade and above each of its columns, a hovering figure with a jeweled head, representing a scintillating star, is placed. It is proposed that lights from concealed sources from opposite sides of the court will be thrown on the cut glass prisms which will be inserted in the star headdress of the figures.

Advancing down the forecourt, or opening of the Court of the Universe upon San Francisco harbor, there is a pool of placid water in which the great Tower of Jewels is reflected. At the end of the forecourt and fronting the Bay of San Francisco, on the sea esplanade, is erected a great figured column, the "Column of Progress." This can be seen prominently from the bay and marks the entrance to the central Court of the Universe, and to the lofty Tower of Jewels designed by Mr. Thomas Hasting, which dominates the architecture of the entire exposition. Converging about the square base of the column, a stream of figures embodying conceptions of the great spiritual divisions of mankind, advance to the doorway in the center of the base, and, as if having mounted within, a frieze of figures appears surmounting the capital of the column 160 feet from the ground, supporting by their united effort a

"FEAST OF SACRIFICE," one of two groups which will surmount pylons on either side of the archway at the head of the Court of Four Seasons, one of the three central courts of the Panama-Pacific International Exposition. The group is the work of Albert Jaegers, one of the foremost of American sculptors. Mr. Jaegers was chosen by congress to execute the Baron von Steuben monument at Washington, D. C., a replica of which was afterwards presented to the Emperor of Germany. He is a member of the National Sculpture Society.

single figure who spends his strength in launching his arrow of adventurous progress. The capital of this column still further carries out the idea of movement and change in progress, for it is composed of wings and figures having a rotary motion. The shaft of the column is decorated with a spiral motive of appropriate symbolism. The sculpture of the column is the collaborative work of Mr. Isidore Konti, who executed the frieze of the pedestal, and Mr. H. A. MacNeil, who designed the crowning group. Mr. W. Symmes Richardson is the architect. Beneath the dome of the pavilions of the Court of the Universe, is a lengthy frieze of

"AMERICAN PIONEER," equestrian statue which is to stand at the entrance to the Court of Palms. The sculptor is Solon H. Borglum, an American of western birth, whose studies of western figures and wild animals of the Rockies have attracted attention throughout the world. Mr. Borglum has modeled the lanky type of Anglo-Saxon frontiers-man. The decorative trappings of the horse show picture legends of American history, the stockade, the tepee, the mission, the cross-surmounted grave. Mr. Borglum is a native of Utah, and a member of the National Sculpture Society.

figures representing the Signs of the Zodiac designed by Mr. Herman A. MacNeil, in such a way that it may be cast for repetitions.

At the western extremity of the East-West axis dividing the main group of exhibit palaces North and South and terminated by Machinery Building, a smaller monumental group is contemplated representing "Modern Civilization," this being designed by Mr. Douglas Tilden, the California sculptor.

The Tower of Jewels, the most conspicuous architectural feature of the exposition, rising to a height of 433 feet, occupying the central portion of the main group of exhibit palaces and flanked on each side by lofty domes and tower gateways, is decorated with much sculpture of a purely ornamental kind, as well as by repeated typical equestrian figure of an armored horseman by F. M. L. Tonetti. At the level of the spring of the great arch of the tower are pedestals which support standing portrait statues of types of Philosopher,

Adventurer, Priest and Soldier by John Flanagan. Terminating the open colonnades on each side of the tower, mural fountains stand created by two of our most talented women, Mrs. Harry Payne Whitney, who designs in accord with Mr. Hastings' architecture, a fountain of "El Dorado," while at the other end of the

"CORTEZ"—Equestrian statue executed by Charles Niehaus. This monument will go at the inner end of one of the oblong pools within the South Gardens, near the Main Entrance to the Exposition.

balanced composition is Mrs. Edith Woodman Burroughs' "Fountain of Youth."

In Mr. Bacon's Court of the Four Seasons, situated between the Agriculture and Educational palaces, the sculpture symbolizes the benign forces of nature. A great group representing "Nature" occupies the pedestal beneath the archway of the head of this court. This, as well as agricultural groups on pylons and several minor figures, were designed by Mr. Albert Jaegers of New York.

"Ceres," by Miss Evelyn B. Longman, is the subject of a classic Greek design in the forecourt, or opening of the Court of the Four Seasons upon the Sea Esplanade along San Francisco harbor, and groups of the "Four Seasons" in plastic form, rendered by Mr. Furie Piccirilli, occupy positions in fountain basins within the colonnades at the four corners of the Court.

Mr. Louis Christian Mullgardt has designed the East Court or Court of Abundance, where the mystic significance of "Fire" and "Water" are treated by the sculptors in the romantic style. Mr. Aitken, Mr. Chester Beach, Mr. Sherry Fry and Mr. Leo Lentelli and others are participating in the realization of those themes.

The subject matter for the sculpture for Mr. George W. Kelham's Court of the Flowers, south of the Court of Abundance and opening upon the South Gardens is founded on the tales of the Arabian Nights. These inspire the composition of the central fountain, now being designed by Mrs. E. W. Burroughs, while the minor decorations of the facades, finials, caryatides, supplement this imaginative mass. The doorways will be flanked by strange visaged lions, and the attic studded with figures of oriental slaves.

For the Court of the Palms, south of the Court of the Four Seasons, the western fairy tales spur the sculptor to new imagery, with "Beauty and the Beast" as the subject for the central fountain. At the entrance to the Courts of the Flowers and of the Palms on the southern esplanade, and on the sea esplanade will be erected four equestrian statues. In front of the Court of Flowers, an equestrian statue of "The End of the Trail" of unusual significance, by James E. Fraser of New York, is placed; in front of the Court of Palms an equestrian statue of the "Pioneer" by Solon H. Borglum; in the South Gardens an equestrian representing "Cortez" by Charles Niehaus; and an equestrian representing "Pizarro" by Charles C. Rumsey of Long Island.

The sculpture for Machinery Hall (by Charles Ward) was entrusted to Mr. Haig Patigian of San Francisco. He is designing four statues representing "Steam," "Electric Power," "Air" and "Water," surmounting columns of entrance to the building, and he executed the two sets of spandrels for the enrichment of the doorways, as well as other decorative features.

There is sculpture also of a more closely applied architectural kind decorating the great arches, towers and facades, statues, spandrels, medallions, friezes in all of which is stamped character, beauty and thought. The sympathetic attitude of the architects, and the spirit of genuine collaboration abroad, have produced a result of unusual interest.

Trade Notes

Perley Hale, architect, has moved his office from room 316 to room 436 McNeece building, San Diego, Cal.

Architect C. C. Rittenhouse has moved his office from the Wilcox building to room 400 Washington building, Third and Spring streets, Los Angeles.

Architect Frederick Heinlein has moved his office from Lissner building to room 412 Washington building, Third and Spring streets, Los Angeles.

C. A. Truesdell, Jr., architectural designer, has moved his office from 408 to 745 San Fernando building, Los Angeles. Mr. Truesdell desires catalogues of building materials.

Architect Joseph Bell DeRemer, Title Insurance building, Los Angeles, Cal., has gone to Grand Forks, N. D., to inspect the Masonic Temple under construction there. Mr. DeRemer is the architect of this building. He will return about April 28.

Architects Coates & Traver, advisory architects to the Fresno Board of Education, have opened offices in the Rowell building, Fresno, and would like catalogues and samples from the trade.

Architect H. H. Lockridge of Long Beach has opened an office at 1415 East First street, moving from 26 Elm street.

Architects Douglas & Hartman, San Diego, Cal., have removed their office from room 608 to room 708, Timken building.

Architects Giesecke & Stevens of Austin, Tex., have formed a partnership, opening offices in the Littlefield building. Circulars and catalogues are requested.

Architects Foulkes & Hogue announce the removal of their offices from 618 Oregonian building to 400 Oregonian building, Portland, Ore.

Architect Fielder Slingluff, Jr., Los Angeles, Cal., is now associated with Arthur W. Lindley, 412 Hollingsworth building, in architectural designing.

Architects R. D. King & Edward Cray Taylor, 528 Consolidated Realty building, Los Angeles, Cal., have dissolved partnership by mutual consent. Mr. Taylor will continue in business at the same address.

Steiger Terra Cotta & Pottery Works, 729 Mills building, San Francisco, have supplied the architectural terra cotta used on the Macbeth Apartments, 745 Geary street, San Francsico; Charles P. Weeks, architect.

Architects Bebb & Mendel announce the dissolution of partnership. Chas. H. Bebb will maintain offices at 503 Denny building, and Louis L. Mendel will open offices in the Oriental building, Seattle, Wash.

Architect R. H. Dobell, who was former instructor in architecture at the Oregon Agricultural College, Corvallis, Ore., has now opened offices at 22 Ainsworth building, Portland, Ore. Catalogues and literature requested.

R. J. Macdonald of Vancouver B. C., has been appointed the external architect for the Pacific Great Eastern Railway Co. Mr. Macdonald previously practiced in Calgary and Edmonton, before locating in Canada had offices in London, England.

The Giant Suction Cleaner Co., Third and Jefferson streets, Oakland, Cal., installed one of their Giant Suction Cleaners in the Henery Apartments, Stockton, Cal., which we understand, is giving excellent service. Glenn Allen, San Francisco, is the architect.

Mr. J. B. Losey, special architectural representative for Berry Bros., Detroit, Mich., who is now located on the Pacific Coast, expects making a trip through the Northwest, covering all the territory in the states of Oregon and Washington, in the interest of Berry Bros.' well-known varnish.

The architectural firm of Parker-Rittenberry Co., composed of Messrs. M. C. Parker, E. F. Rittenberry and A. S. Harris, formerly connected with the firm of C. D. Hill & Co., have established offices in the Praetorian building, Dallas, Tex., and are open for manufacturers' catalogues.

The Simplex Window Co., San Francisco, have installed their modern Simplex Windows in the Belgravia Apartments, Starr & Larsen, owners. These windows make a very handsome appearance, as well as being of great service. Frederick H. Meyer, San Francisco, is the architect.

N. Clark & Sons, 116 Natoma street, San Francisco, have furnished the architectural terra cotta of the White Mat Glaze Quality for the exterior trim on the Belgravia Apartments, Sutter and Jones streets. They have also furnished the terra cotta used on the Warrington Apartments, Post and Leavenworth streets: Frederick H. Meyer, architect, San Francisco.

The Los Angeles Pressed Brick Co. informs us they are placing 1400 squares of roofing tile on the State Normal School building in Los Angeles, Cal. This is an exceptionally large job, and speaks highly for the quality of the material this firm manufactures. The State Architectural Office, engineering department, Sacramento, Cal., are the architects on this building.

The Hoffman Heater Co. have installed a 200-gallon storage heater, which furnishes an abundance of hot water, in the residence of Mr. A. B. Spreckels, corner of Washington and Octavia streets, San Francisco. They have also installed a No. 6 instantaneous heater which supplies 6 gallons of hot water per minute in the residence of Mr. H. M. Holbrook, of the firm of Holbrook, Merrill and Stetson.

The Otis Elevator Co. have furnished the elevator equipment used in all the apartment houses shown in this number of "The Pacific Coast Architect." This is rather a coincidence from the fact that none of the buildings were selected for this reason, but it demonstrates the popularity and efficiency of the Otis Elevators being so universally used that taking a number of buildings like these at random, the Otis Elevator is installed in every one.

The California Fresh Air Bed Co., having their main office at 168 Geary street, San Francisco, advise that they have recently started up their new factory, located in West Berkeley, Cal., and have quite a rush of orders on at the present time, more than they are able to fill for some months to come. This factory is 80 x 400 feet with an "L" of 80 x 176 feet. This is good news, and gratifying to learn owing to the dull business conditions over the United States, that this concern is enjoying prosperity, which speaks very highly for their Indoor-Outdoor Beds, and the popularity which they have obtained on the Pacific Coast.

The National Mill & Lumber Co. furnished twelve single and forty-two pairs of their Pitcher Disappearing Doors in the Belgravia Apartments, Sutter and Jones streets, Starr & Larsen, owners; Frederick H. Meyer, architect, San Francisco. We learn from the foreman, Mr. Al. Wood, that this installation has been done in a first class workmanlike manner, and the job is a credit to the manufacturers of the patented Disappearing Doors. The Pitcher Door is being universally used of late, as they can be installed in five and one-half inch partitions, no extra thickness of the wall is required, and in numerous cases, they have proven quite practical in places where it is not possible to insert a swinging door.

There was a time when the location of an apartment house was the chief factor in determining the extent of popularity it would attain. Today the quality and harmony of material used in finishing and the beauty of architecture and convenient arrangements of the rooms are the first considerations of tenants. Knowing these facts, the firms who supply finishing materials, and the architects who plan the buildings and specify goods to be used are devoting much time to these details and the results are astonishing. The firm of W. P. Fuller & Company advise us that they maintain a very thorough follow up system along these lines. They receive advance reports of all apartment houses to be constructed, study every detail of the advance specifications and send a specialty man to confer with the architect. The resultant specifications have done much to increase the attractiveness of our beautiful apartment houses.

CALIFORNIA.

San Francisco—Working drawings are now being prepared by Willis Polk & Co., Merchants' Exchange Building, San Francisco, for a seven-story and basement apartment house for Mr. John W. Proctor. It is to be complete steel frame and of brick exterior and erected on the south side of California street near Mason.

Architect Sylvain Schnaittacher, First National Bank Building, has been commissioned by the Taxicab Co. of California to prepare plans for a large commercial garage building to be erected at the northeast corner of Bush and Larkin streets, of Class A construction.

Architects Shea & Lofquist, Bankers' Investment Building, San Francisco, have completed plans for the St. Patrick's Church restoration, brick and steel, which will cost $80,000.

Architects Rousseau & Rousseau, Monadnock Building, San Francisco, are preparing plans for a fifteen-story and basement Class A construction hotel, to be erected on the west side of Powell street, north of Post, and will be fireproof throughout. The cost will be $190,000.

Architects O'Brien Bros., Clunie Building, San Francisco, have completed plans for an ice and cold storage plant, three stories and basement, brick and steel, to be erected for F. E. Knowles. Cost is to be $150,000.

Architect Frederick H. Meyer, Bankers' Investment Building, San Francisco, has completed plans for a seven-story and basement brick and steel hotel, to be erected for Trowbridge & Perkins on the corner of Post and Shannon streets, and to cost $80,000.

The Southern Pacific Co. will erect railroad stations, yards and freight sheds at Third and Townsend streets, to be of reinforced concrete and frame, at a cost of $1,000,000.

Architect C. H. Barrett, 381 Bush street, has been commissioned to prepare plans for a large Class C apartment house, which will be erected at the northeast corner of Post and Polk streets. Estimated cost, $100,000.

Los Angeles—Architects Morgan, Walls & Morgan, 1136 Van Nuys Building, are taking bids for the eight-story and basement reinforced concrete office building to be erected at the northwest corner of Sixth and Los Angeles streets, for William G. Kerckhoff. Estimated cost, $400,000.

Architects G. F. Costerisan and J. F. Kavanaugh, 922 California Building, have completed plans for the four-story and part basement brick store and hotel building, to be erected on the west side of Olive street, between Seventh and Eighth streets, for J. B. Solomon. Cost about $60,000.

Architect George W. Eldridge, Marsh-Strong Building, Los Angeles, is preparing plans for a twelve-story and basement reinforced concrete office and store building, to be erected on Spring street, between Sixth and Seventh, for the Spring Street Investment Co., at a cost of $350,000.

Architect Leonard L. Jones, 1125 Central Building, has completed plans for the four-story and basement brick apartment house, to be erected at the southeast corner of Orange and Kipp streets, for C. W. Howard.

Architects Reed Bros., San Francisco, are revising preliminary plans for the steel frame loft and office building, to be erected at Eighth and Broadway, Los Angeles, for Hulett C. Merritt of Pasadena.

Architects John M. Cooper & John J. Cornwell are preparing plans for an eight story reinforced concrete hotel building at the northwest corner of Fourth and Olive streets, for the Alta Planing Mill Co., to cost $210,000.

Architect John H. Brown, Hollingsworth Building, is preparing plans for a five-story and basement Class B hotel for Dr. Hamilton Forlme, to be erected on Figueroa street near Sixth, at a cost of $145,000.

Oakland—Architect Walter Reed, Oakland Bank of Savings, Oakland, is preparing plans for the erection of a two-story and basement reinforced concrete and brick warehouse for W. P. Fuller & Co., to be erected on the corner of Third and Jackson streets, at a cost of $50,000.

Architect Charles P. Weeks, Mutual Bank Building, San Francisco, is preparing plans for a hospital group. There is a one-story building and one building containing four stories and basement Class A construction, for Alameda County, at a cost of $1,500,000.

Architect John J. Donovan, Security Bank Building, Oakland, is preparing plans for a Municipal Auditorium, three story and basement, Class A construction, for the city of Oakland, at a cost of $1,000,000.

Fresno, Cal.—Architects Swartz, Hotchkiss & Swartz, Fresno, have completed plans for the new church for the First Christian congregation at N and Tuolumne streets, Rev. H. O. Breeden, pastor. Estimated cost, $50,000.

Stockton, Cal.—Architects Stone & Wrieht, San Joaquin Building, Stockton, have completed plans for a two-story and basement brick and steel academy for the St. Agnes Academy at a cost of $70,000.

Berkeley, Cal.—Architect Edward T. Foulkes, Crocker Building, San Francisco, is preparing plans for a two-story and basement Class A theater for the Bishop Co., at a cost of $70,000.

Alturas, Cal.—Architect F. J. DeLongchamps, Reno, Nev., has completed plans for a two-story and basement and dome reinforced concrete Court House for Modoc County, at a cost of $90,000.

Colusa, Cal.—Architect Henry C. Smith, Humboldt Bank Building, San Francisco, has completed plans for a two-story and basement reinforced concrete Hall of Records for Colusa County, at a cost of $60,000.

OREGON AND WASHINGTON.

Portland, Ore.—Architect Aaron Gould, Henry Building, Portland, is preparing plans for a four story and basement reinforced concrete theater and office building for Melvin G. Winstock. The building will be erected at the corner of Park and Stark street and will cost $100,000.

Working drawings have been completed for the construction of the pavilion for the State Fair by State Architect W. C. Knighton. It will cost $44,470.

Astoria, Ore.—Morgan, Fliedner & Boyce contemplate erecting a large apartment building in Astoria at a cost of about $50,000.

Portland, Ore.—Details for the proposed building to be erected on East Side, a portion of which will be occupied by the East Side Business Men's Club, are progressing and it is planned to have matters well under way soon. It is to be on the corner of Grand avenue and East Alder street and will cost $80,000.

Portland, Ore.—Plans for a three-story fireproof building, to be erected at the southeast corner of Fifth and Burnside streets, for A. C. Ruby, are being prepared by Mr. W. B. Bell, at a cost of $50,000.

Portland, Ore.—Plans for a moving picture theater are being prepared by Emil Schacht & Son. The building will cost $20,000.

Port Angeles, Wash.—Architect Francis W. Grant, Globe Block, Seattle, has completed working drawings for a three-story and basement lodge hall and stores of brick and steel at a cost of $35,000.

Seattle, Wash.—The Port of Seattle Commission, Central Building, Seattle, have completed plans for a four-story and basement reinforced concrete warehouse for the State of Washington, at a cost of $200,000.

Seattle, Wash.—Architect Frank H. Fowler, Central Building, Seattle, has completed plans for a three-story and basement brick apartment house for D. O. Boyd, to be erected at a cost of $35,000.

MISCELLANEOUS.

Vancouver, B. C.—Architect B. Dudley Stuart, Metropolitan Building, Vancouver, B. C., is preparing plans for the proposed two-story $30,000 brick apartment house at Broadway and Stock streets for J. J. E. McCague.

Architect A. A. Cox, Carter-Cotton Building, is completing plans for the three-story fireproof Isolation Building addition for the Vancouver General Hospital, to cost about $90,000.

Architects Sharpe & Thompson, London Building, are completing plans for the construction of the first unit of the proposed University of B. C. Buildings at Point Grey. Work to be undertaken this year will cost about $500,000.

Architects Maclure & Fox, Pacific Building, have completed plans for an additional building to be erected for the Western Residential Schools in the Shaughnessy District, to cost about $50,000. It is to be two and a half stories high and of frame and brick veneer construction.

Edmonton, Alberta—Architects A. M. Jeffers & W. A. Wheeler have been appointed to prepare plans for a hotel building costing $300,000, to be erected on the site of the St. Elmo Hotel, Edmonton, for Robert Moore.

George Pearson, a capitalist of Warwick, Eng., will erect a ten story business and office building and a theater building, to be erected on Second street. The first will cost $600,000 and the last $400,000.

Victoria, B. C.—Miss McCalmont, a hospital expert, has suggested several changes in the plans of Architect Loring P. Rixford for the $500,000 Royal Jubilee Hospital Buildings in Victoria.

Calgary, Alberta—Plans for the first unit of the Calgary University, prepared by Architects Hodgson, Bates & Beattie, have been accepted by the University Governors. It is to be reinforced concrete, three stories, and will cost $125,000.

Kingman, Ariz.—Revised plans for the proposed $65,000 Court House for Mojave County, of which Kingman is the county seat, will be completed by the architects, Lescher & Kibbey, 400 Bank of Arizona Building, Phoenix.

Phoenix, Ariz.—Architects Royal W. Lescher and J. Ruker Kibbey, 400 Bank of Arizona Building, have been commissioned to prepare plans for remodeling the old State industrial school at Benson into a new high school building for the Benson High School District, which has taken over the building and site from the State. Estimated cost, $40,000.

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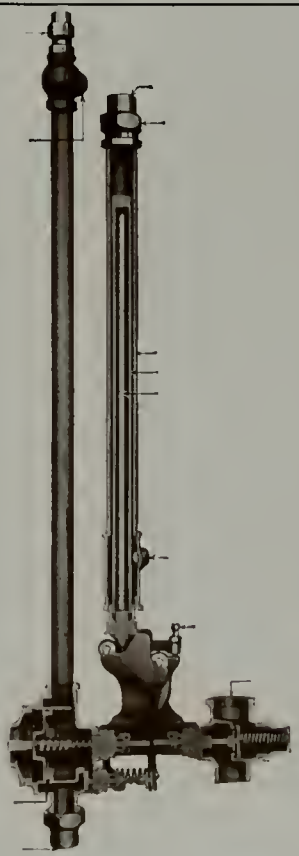

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CALIFORNIA

VOLUME SEVEN
NUMBER FOUR

JUNE, 1914

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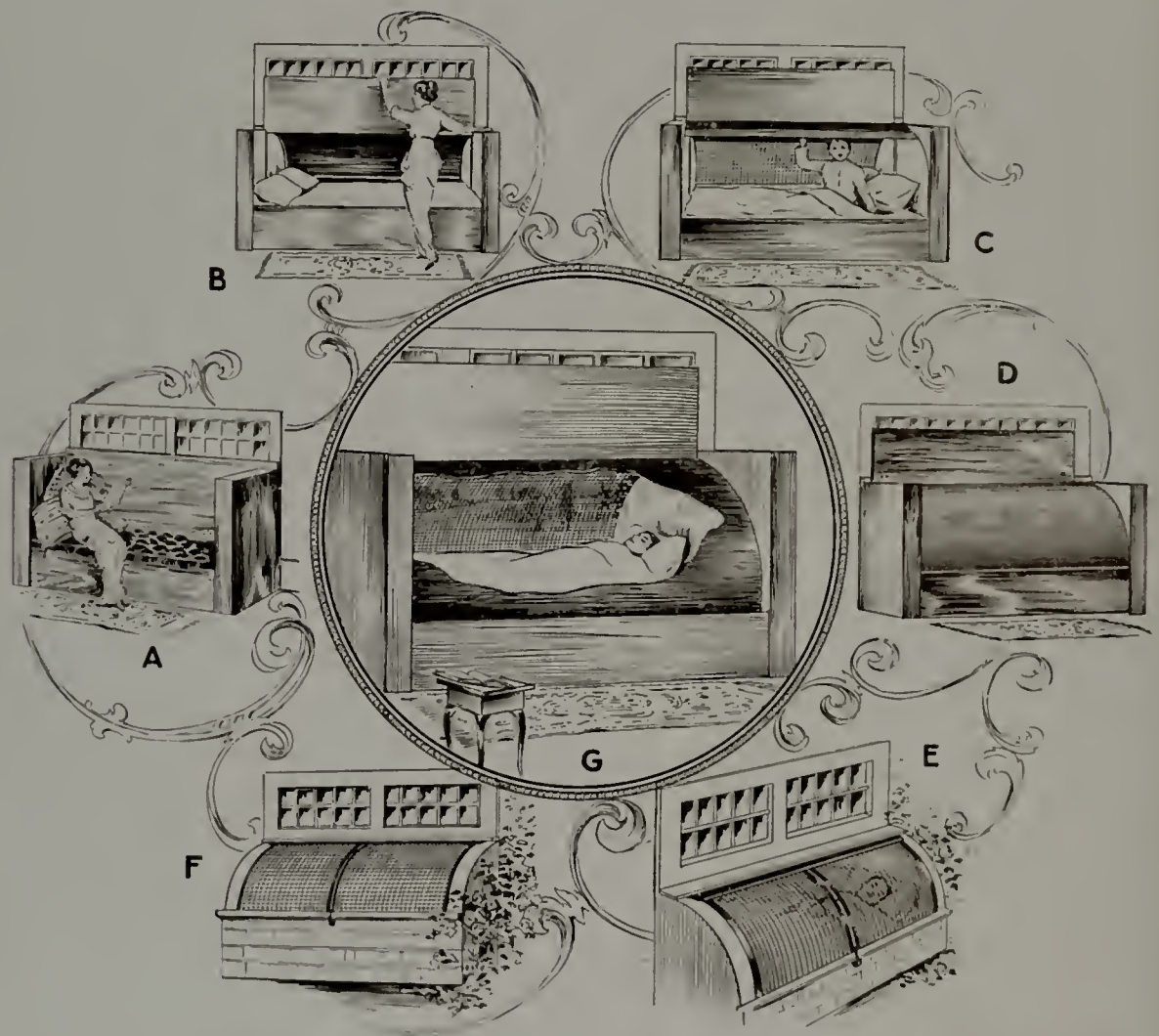

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The Pacific Coast Architect

VOLUME VII — SAN FRANCISCO, CALIFORNIA, JUNE, 1914 — NUMBER 4

THE PACIFIC COAST ARCHITECT

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EDITORIAL.

Name to Adorn Building

The members of the Oregon chapter of the American Institute of Architects have agreed informally to follow the plan of placing their names on buildings of which they are particularly proud. This plan has been recommended by officers of the parent institute and is being indorsed by the chapters of the organization all over the country.

Often the public accepts a building without ever stopping to ask who contributed the design, the whole work being regarded as the work of associates. By placing picturesque or sober signatures on noteworthy buildings in the form of brass nameplates, the architects believe honor will be paid where it is earned and that an additional incentive will be given painstaking effort.

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French Staircase House

The "staircase apartment" erected at 26 Rue Vavin, on the left bank of the Seine, Paris, has aroused among architects considerable comment and discussion. The structure is seven stories in height, each story receding some feet from the story below it so that the entire front bears some resemblance to a huge staircase. The house stands in a crowded apartment section. The front of each story thus opens upon a terrace, constituting the roof of the apartment below it, enabling the occupants to be out in the open air as much as they wish without leaving their apartment.

On account of the additional light which reaches the street on which their novel building is situated, it has sunlight for almost one hour longer than the streets parallel to it. The apartment house is built of reinforced concrete in such a way that no floor has to support the weight of those above it. This is secured by pillars perpendicular to the street level, to which beams supporting each floor are attached. By employing this method, the architects claim to have provided something better than the usual type of apartment house construction at a smaller cost.

Architects Bury Axe at Banquet

Peace and harmony reign in the ranks of the San Francisco chapter of the American Institute of Architects, following a banquet given Tuesday evening, May 5th, in honor of the San Francisco Public Library competition jury, which met earlier in the day and organized by electing James D. Phelan chairman and Paul P. Cret, of Philadelphia, secretary. The other member is Cass Gilbert, a New York Architect.

The banquet served a double purpose, in that it took the form of a reunion and reconciliation within the chapter between the members and Frederick H. Meyer, John Reid, Jr., and John Galen Howard, consulting architects of the City of San Francisco, who were in controversy with the chapter over the Civic Center project.

The presence of the three members at the banquet last night was the result of an action taken several days ago by the Board of Directors of the San Francisco chapter in presenting a resolution expunging the whole matter from the record. The resolution was passed unanimously.

William Mooser, who was prominent in the fight a year ago, said: "The hatchet has been buried and everything is serene again in the chapter."

It was intimated that a sentiment to bridge the discord that followed the trial of Architects Meyer, Reid and Howard has existed ever since the affair happened.

The three reinstated members took an active part in the festivities that accompanied the banquet. George B. McDougall acted as toastmaster.

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Manufacturers Creating Demand for Their Product

When the Standard Oil Company first went to China it found its sales limited by the fact that most persons had no suitable lamps. So the company had a lamp made for the burning of kerosene which it sold to the Chinese for seven and a half cents apiece. In the first year 875,000 lamps were sold, and in the year following 2,000,000. With lamps to burn the oil and give good light the company's kerosene sales climbed like the flight of a balloon. This lamp has enabled the toiling Chinese to add several hours to his work day, has promoted the business of the company, and has carried light in a very real sense into the dark places of earth. Here we have an excellent example of the working of modern industry. It goes into the world looking for markets, and if it can not find them it makes them. Our railroads build into unpeopled territory, then bring in settlers, then carry out their produce. Factories produce a new food, then create a desire for it in divers alluring ways. You have no need for what we offer, says the up-to-date manufacturer. Very well, we'll furnish you with a need, and straightway proceeds to do so.

The Architect Saves You Money

By Louis C. Newhall, President Boston Architectural Club.

The architect, like Shapespeare's "Man," plays many parts in his profession. Yet the part he plays in the planning and erection of a building of any kind is an almost unknown quantity in the minds of business men and owners generally, whether this involves the expenditure of much or little money in the building of a small private house or the erection of an imposing business structure.

The province of the architect bears the same relation to the owner as that of a specialist in medicine to his patient. It is the architect's business to know all the conditions that the owner wants to meet in a house or building.

It is the architect's business to be so familiar with costs of labor and materials that he can, with a reasonable degree of accuracy, tell the intending builder the cost of the structure that is to be built. It goes without saying that a specialist in medicine will often save the cost of his fee to his patient by knowing exactly what to do, and so where an owner consults an architect who has had training and experience, he will pay for the cost of services and obtain a result proportionate thereto.

It has been a mistaken notion on the part of many people that the employment of an architect would necessarily increase the cost of a building. This is not so, because the trained architect, knowing his cost of labor and material, will so apportion this cost and so plan his building that he will save his commission to the owner by economical planning and designing, and at the same time produce the most economical building, at the least possible cost.

This is where the owner many times makes his mistake. The public at large do not realize that architecture is a precise profession; one that is based absolutely on experience in building matters, and that the trained architect can and does build economically and reasonably, and that he can obtain, with the use of the same amount of labor and materials that an untrained man would use, results far better than this same untrained man, under the same circumstances, and oftentimes at less cost.

Real estate owners, and men who develop property, think many times that they are economizing in obtaining mediocre ability and that by buying plans outright from builders they are saving on their investment. The result is quite to the contrary. After the development is completed, the buildings done, they find they do not have the investment value that some other building, or some other property has which has been carefully considered, not only from the standpoint of architecture, but from the standpoint of investment also.

Too often the real estate promoter cuts his nose off and never realizes that his property is not as attractive as some other, and does not yield the same proportionate profit. It has been demonstrated to many real estate promoters that the employment of the very best class of architects obtainable is really the wisest kind of an investment for them, and a real economy in the long run.

This is true, not only in designing, but in superintending of buildings, for the architect who is thoroughly trained should be of decided value to an owner in the carrying out of any building project. There are numberless instances during the progress of a building where an architect's advice, decision and initiative are of the utmost value and importance.

The Renaissance in Spain

The architects of California should feel a great interest in the architecture of Spain. No country approaches so nearly our climatic conditions. This, of course, applies especially to Southern California. Our clear blue skies, warm yellow sunshine and brilliant flowers present an opportunity for composition for which we should feel very grateful.

Glancing at the Spanish Renaissance as an impression, we are conscious primarily of the desire of the builders to shelter the occupants from the heat and light. This necessity produced the broad cornice and its transparent purple shadow which, when thrown on a delicate cream colored wall surface, produces a feeling of delicacy and charm which never fails to fascinate.

It was apparently with regret that these old Spanish architects penetrated the smooth, clean wall surfaces at all. It is certain that when a doorway was completed they had usually produced a finely modeled and highly interesting motif. A motif which never failed to draw the eye of the passerby to the natural doorway of the building, leaving no doubt in his mind that this was the only proper way to enter. Its larger detail could be interpreted from a considerable distance, the red tile of the roof, the flash of white wall and the ornamental doorway. You are drawn by these to a closer examination of the facade when the form of the rich brown carved brackets supporting the cornice can be followed.

The Spanish Patio or inner court, which has such a great influence over American domestic architecture, is accountable for some of the most charming work in our country. The Patio originally served as a semi-sheltered space where delicate flowers could be raised and where in the evenings the family might sit and enjoy the cooler breezes without exposure to them.

From an architectural, or more properly, as applied to the Spanish Renaissance, from a decorative standpoint, the development was largely accountable to the early influence of the Moors. These people were driven from Spain in 1492 but only after they had left a stamp of their characteristic sense of texture and color on most of the work of Southern Spain. This is exemplified most noticeably in Toledo, the Moorish capital, by the Saracenic features such as the horseshoe arch and the elaborate pierced stone tracery. Attention is called more particularly to the Jewish synagogue at Toledo, where the flowing patterns and intricate geometrical designs show a patience and ambition and striving for beauty which cannot fail to stir the admiration of all of us.

The curious early churches of the Spanish conquerors seem to have been executed by the aid of Moorish craftsmen. In speaking of cathedrals, it is interesting to compare Leon with Amiens, its French prototype, and it is difficult to prevent the admission that it surpasses the latter in many respects most noticeably perhaps in the expanse of fenestration and the tenuity of its supports.

Probably the period which marks the actual birth of the Spanish Renaissance should be fixed by the Estilo Mudjar (Casa de Pilatos) (House of Pilate). This marks the curious mixing of the Moorish and Christian architecture of Spain. With abundant cream-colored stone, a plentiful supply of iron ore, supplemented by a love of art and form, these beauty-loving people have produced what is undoubtedly the most picturesque and delightfully delicate inspiration for the architects of the world to profit by.

Their sense of scale and of values in architectural motif is not surpassed by that of any other people.

Over 5,000,000 Yards Concrete Placed in Panama Canal

The amounts of concrete laid in the major features of the Panama Canal and its auxiliary works up to March 1, 1914, are as follows:

Item—	Cubic Yds.
Gatun Locks	2,068,424
Miraflores Locks	1,506,563
Pedro Miguel Lock and Dam	929,232
Gatun Dam and Spillway	232,256
Miraflores Dam and Spillway	79,004
Pedro Miguél-Miraflores Duct Line	2,193
Central Division	1,271
Balboa terminals	69,996
Cristobal terminals	63,785
Hydroelectric station	14,323
Transmission line	6,939
Aids to navigation	*5,000
Relocated Panama railroad	63,123
Permanent buildings, Balboa	7,202
Total	5,053,311

*Approximate.

Including the work on fortifications, the pontoon barge piers at Paraise, quartermaster's construction, municipal engineer, etc., the total concrete placed by the American canal forces is well above 5,000,000 cubic yards.

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Electrolytic Action on Structural Materials

By Charles T. Phillips, C. E.*

The subject of electrolysis should be of great interest to the architect and building owner. Very little has been written on the subject for the architectural or engineering publications, due, no doubt, to the little interest that has been given to the electrolytic deterioration of materials used in building construction.

It is a well-known fact that when two dissimilar metals are metallically connected and buried in damp earth, a current of electricity will flow from one metal to the other, and the metal from which the current flows will lose weight. This galvanic action between two dissimilar metals is one form of electrolysis and may be confined to a small or large area in a portion of a building superstructure or foundation where conditions are favorable for this action. In the lower sections of a city where buildings are located on made ground, the foundations of which may be below sea level, the presence of salt in the moist ground will form a favorable element for local galvanic currents or for electrolysis from stray electric railway currents.

Electrolysis from electric railway current is caused by the current leaving the rails on the single wire trolley system and passing into the earth, thence into pipes and into the metallic substructure of buildings. The electrolytes that are adjacent to the metal split up electro-chemically into non-corrosive elements and acid-forming radicals. Where the current enters the metallic structure, the non-corrosive radicals appear and produce corrosion.

Every electrical current must complete its circuit and, in the case of the single overhead trolley system, the current from the dynamos at the generating station is delivered to the trolley wire. From the trolley wire the current passes down the trolley pole on the car into the controlling apparatus and motors, and then into the rails. The rail serves as the return wire to the starting point or the dynamo. The electric railway companies usually use this system and the iron rails are intended to form the negative conductor or return portion of the electrical circuit. In actual practice much of the current leaves the rails and returns through the earth and along such buried metal conductors as may form a path of least resistance. The lead sheaths of telephone and power cables, water and gas mains and substructures of buildings thus form the path of the return circuit. Where stray currents flow from underground structures of iron it has been estimated from tests made that there will be a loss of twenty pounds of iron per year for every ampere of current flowing. For other metals the loss will be more or less, depending upon the kind of metal.

While it has been generally assumed that electrolysis is produced only by direct current and that there is no electrolysis from alternating current, a decision has been reached by prominent engineers who have made investigations, that there is electrolysis action from alternating current. It is much less in extent, however, for the same quantity of electricity than with direct current.

The corrosion of iron or steel buried in earth or in concrete may be due to galvanic action caused by the physical or chemical difference between adjacent points on the surface of the metal, to the presence of foreign substance in the soil or concrete such as coke, iron oxides, cinders, etc., which set up galvanic action, or it may be due to an electric current which is leaving the metal at the point of corrosion. While corrosion of iron by electric currents may be influenced by a variety of causes, the extent of the corrosion is to a large degree a function of the quantity of electricity that is discharged from a given surface.

The tendency of different kinds of iron to suffer damage from electrolysis has been the subject of a number of tests and experiments, and it has been found that there is no marked difference between irons and steel. Cast iron is possibly the least affected, while steel is the most susceptible to electrolytic corrosion. This may be due to the protecting coat of scale on the cast iron and that the cast iron has a tendency to corrode more uniformly than the steel, which seems to be attacked more often in spots.

When iron corrodes it is always with more or less irregularity. Pitting on the surface may be practically confined to various size areas on the surface of the iron and small pits on the surface may communicate with a large chamber below. Frequently a honeycombed effect is produced and particles of the iron will fall away from the original body.

The possibility of damage to concrete structures by electric currents has aroused considerable apprehension that great damage may be in progress due to this cause. A number of theories have been advanced to account for the deterioration of concrete where the presence of electric currents were noticed. The passage of an electric current will cause heat and it is thought that where the current density is high, it may produce cracking; or gas may be liberated within the concrete, developing sufficient pressure to crack the concrete. That the concrete undergoes a chemical or physical change whereby it becomes soft and fragile, due to the passage of an electric current, is another theory. Where iron is buried in the concrete, corrosion of the iron results in the production of insoluble compounds of iron, which form near the surface of the iron and occupy about 2.2 times as much space as the original iron from which they were formed, thus developing sufficient mechanical pressure to crack the concrete. Formations of deposits of iron compounds, chiefly hydrates, within the pores of the concrete and

*Pacific Building, San Francisco.

those on oxidation developed the force that may cause cracking. No injurious effect has been noticed where iron is buried in concrete and the current flows from the concrete to the iron. Tests on specimens of concrete with an iron anode imbedded and the concrete kept thoroughly wet showed that water was forced out around the iron, evidently due to the formation of gas which, on escaping, forced the water through the pores of the concrete. This water carried calcium hydrate in solution, and the surface of the concrete surrounding the iron became quite soft. The bond in this case between the iron and the concrete was reduced to about one-fifth of its original value. The current had no effect on the strength of the concrete remote from the iron, so it may be assumed, in as far as this test is considered, that the concrete is only damaged in close proximity to where a metal is imbedded in the concrete.

The presence of salt in concrete, either having been put there during construction or from contact with salt water in the earth, has a very marked effect upon the amount of damage that can be done.

Tests made in the laboratory may not be considered as representing what would take place in the earth under normal conditions, but they are very satisfactory for studying the laws of corrosion and to form a basis upon which further investigation can be made.

The plan adopted in some cities to prevent electrolytic deterioration is to avoid an earth return for the trolley current. Washington, D. C., and New York have a double underground trolley, both positive and negative conductors being insulated from the ground. Cleveland has a double overhead trolley and Chicago is endeavoring to solve this problem by minimizing stray currents.

While a great deal of good may be done to prevent electrolysis in building foundations and footings by proper construction, a great many attempts to apply a remedy have failed, due to a lack of knowledge of what constituted a remedy.

The Quantity System of Estimating

A Paper Delivered Before the Technical Society of the Pacific Coast by G. Alexander Wright.*

The measurement and description of mechanics' work and the placing of money values against such description is not new. Occasionally, when discussing the quantity system, one hears it spoken of as a "new idea." But it is not new by any means. The practice, however, of making a fixed "quantity" of material and labor the "essence" of the contract, if not new, is certainly "modern."

Historically speaking, there were measures of quantity, areas and distances in very early times. Ezekiel, the prophet, speaks of a man with a line and a measuring rod in his hand. Someone has said it was just a twelve foot rod, such, for example, as we might use today. Then in Zechariah, reference is made to the length and breadth being taken of Jerusalem.

That the Greek architects took their measurements and made up their estimates of costs is generally admitted. Vitruvius, in his Handbook of Architecture, written about the time of Augustus, mentions as one of the essential qualifications of an architect, that he must be a good arithmetician "to work out measurements and to estimate the cost of buildings." Indeed, in the case of public work in the city of Ephesus the architect was obliged to give a figure representing the cost of the work, which was retained by the chief magistrate, and honors were conferred upon the architect if, at the end of the job, this estimate or cost had not been exceeded. If, however, the cost materially exceeded the estimate, the architect had to make up the deficiency, and it is said it was a matter of regret to Vitruvius that there was no such provision in the Roman law. Then, again, among the Greeks it was customary upon public work to publish itemized detailed accounts of the actual cost of such works, as well as the architect's estimate. Payment by measurement was very common, and we find references to a type of engineer-architects who measured buildings and whose reports finally settled matters—a sort of arbitrator. Here it will be seen, therefore, that we have distinct references to the principle of "payment by measurement," the modern equivalent for which is the quantity system, whilst the Greek engineer-architect accords very closely to the quantity surveyor of today.

Enough has been said to show that the measuring (or we say "quantity") surveyor has existed, certainly from the time of the Greeks and Romans. The quantity system as we know it today had its origin some eighty years ago when competing bidders met and one of their number was selected to take off the quantities and furnish a copy to each of his competitors.

Better methods in time prevailed until the system was evolved such as I expect to see adopted in the United States, i. e., compensation to the contractor through definite measurement being made the basis of the contract.

Competition, so called, among contractors is comparatively a modern innovation. The words "so called" are used intentionally, for under the prevailing conditions, competition intelligently and conservatively conducted is the exception, and not the rule. Our methods today are largely gambling methods when it comes to ascertaining the quantities of materials which go to make up a structure and which must, of course, be accurately ascertained before an intelligent, satisfactory bid can be made. So true is this that it is a matter of common knowledge that fully fifty per cent of the contracts let are the result of error, and further, that the more capable and careful a bidder is to get in all his items, the less chance he has of securing a contract, profitable or even otherwise. The lowest bid, the one generally accepted, is usually anything but the most accurate.

One of the greatest inconsistencies also in competitive estimating lies in the fact that no sooner are bidders invited to give a price on a job than they seem to compete among themselves to see who can take off the least quantity of material, etc., and it is surprising how well some of them succeed.

The quantity system is not, as some persons have supposed, merely the taking off of a list of items by one person, for one other person's use, nor does it consist solely of the listing of items by individual contractors with varying methods and uncertain accuracy, owing in part to the fact that contractors are seldom if ever allowed proper time in which to make up an accurate bid. It must not be overlooked that some "training" is also essential to the accurate preparation and classification of quantities.

What the Quantity System does mean, however, is the careful measurement by an independent person specially trained in this special kind of work, and the present age is undoubtedly the age of the specialist. This specialist or quantity surveyor proceeds with his

*President of the Technical Society of the Pacific Coast.

work somewhat differently to the average contractor, for he follows certain recognized rules in taking off, abstracting and billing, with a view to eliminating error. He uses also certain uniform standards of measurements and expression. Every written word or figure is preserved for future reference. His checking and rechecking methods to insure accuracy must be studied to be appreciated by those to whom the Quantity System is unknown. A record is made of every item, however small, having a money value. These items are then all classified and arranged, each under its proper trade or department in methodical order. Guess-work methods are unknown to the quantity surveyor, whilst his accuracy and attention to details is well worthy of comment.

The surveyor who does this work is a professional man similar to the engineer and the architect. He should, in fact, have, and usually has had, some experience at least in the work of these professions, and in addition, a practical experience acquired in the field in actual superintendence of construction work.

Such a surveyor then upon commencing to take off quantity from an architect's or engineer's drawings, readily detects any ambiguities or discrepancies which exist, through hasty preparation or otherwise. Attention of the architect or engineer is at once called to such matters by the quantity surveyor, as he goes along. Being so detected, such ambiguities and uncertainties can be, and are, corrected and adjusted, so that by the time the drawings and specifications reach the bidders for estimating purposes, all doubts have been cleared up, and everything has been made so plain and accurate that the possibility of error in quantities can be practically disregarded.

This document, prepared exclusively in the surveyor's office, is then either printed or similarly reproduced, and a fac simile copy supplied free of cost to each bidder, who inserts his unit price opposite each item, and readily foots up the money cost in dollars and cents, and which really is all that he should be asked to do. The quantities of materials and labor then set forth in this document, or bill of quantities, represents the limit of what the contractor will be called upon to perform or furnish, in order to complete his contract. In short, the bid becomes a proposal to do a certain "fixed quantity" of work, indicated in the quantities, no more and no less. The contract to be drawn accordingly. This then very briefly is the main underlying principle of the Quantity System of Estimating, a definite quantity of work for a definite price, and payment according to a well defined systematized method of measurement, and the entire elimination of those well-known conditions and elements, which now compel bidders to take chances, and for which all parties usually suffer in the end, the owner included.

Most of us are familiar with these wasteful, unsatisfactory methods, and sometimes, even pernicious practices, which are followed today in bidding upon and carrying out work. These injure both parties to a contract, and they arise largely from bidders' mistakes in figuring, because accuracy has to be so often sacrificed for an ill-advised speed. A large proportion of these mistakes occur in the hurried figuring of the "quantities" by bidders. Some of us, when we have the opportunity of looking behind the scenes, so to speak, become appalled at the resultant effects of existing practices, such as the enormous waste in time and money in useless figuring, disputes, harassing conditions, hard feeling, lack of confidence, delays, suits at law, and so forth, nearly all of which may be avoided by adopting more conservative, modern methods in our preparatory work before contracts are let. Further, interpretation of plans and specifications should, in common fairness to both parties to the contract, be made wherever possible, before a contract is let, and not be left until afterwards, nor to be done "as directed." Under the Quantity System, where the quantities are made the basis of the contract, this becomes practically imperative. Regarding interpretations, one might be excused for saying that it would seem, as engineers or architects, to be a question of policy as well as fairness whether we should continue to even assume the responsibility of deciding things already contracted for, according to our "judgment." If our judgment is to govern what a contractor must do, would it not be better to consider those things which can be considered, and then determine them finally before a contract is let. Many an architect and engineer has suffered professionally through assuming to exercise judiciary powers unnecessarily. But, to return, notwithstanding the fact that over 40 per cent of the entire population of our cities are dependent directly or indirectly upon the construction of buildings, yet the methods generally followed to determine the important question of contract cost are those used generations ago; they come to us as a tradition from the period when tallow candles were used. Whilst we have made wonderful strides in constructive methods and materials, and, let us hope, in design, little or no attention has been given to standardizing estimating methods. We seem to have been too busy "speeding up" to regard seriously the advantages of accuracy when it comes to spending money on construction. In the end, of course, it is the owner, the financier, who suffers. There are, however, indications as a result of the movement initiated in San Francisco that more conservatism and a closer adherence to business principles are going to be preferred by the moneyed interests in place of the guesswork and gambling methods which they have overlooked in the past.

A contract, according to Blackstone, is "an agreement upon sufficient consideration to do, or not to do, a particular thing." The lowest bidder today will scarcely admit that the contract consideration is sufficient, or that his contract obligations are limited to do any one particular thing. It would also seem that architects or engineers who permit an unduly low bidder to sign up for a piece of work are courting trouble, and in such cases, where they have constituted themselves sole arbiters of the contract, their judicial powers, if exercised, is open to criticism.

The principle of measure and value, or payment by measurement, usually designated as the Quantity System, is based upon equity and square dealing. On large work it is used in Germany, France, Ireland, England, Australia, Scotland, and even in South Africa, where some thousand miles or more north of Cape Town we find not only an Institute of Architects, but an Institute of Quantity Surveyors, and it is a significant fact that in no instance where the system has been once established has it ever been abandoned for their former haphazard methods, and which corresponds with those we have employed for generations past and still use.

Among the advantages and improved methods of estimating afforded by the Quantity System may be mentioned: First, the enormous saving of time and money now wasted by numerous bidders all doing the same thing, going over the same ground. Second, safer bids will be made, as the volume of work to be

(Continued on page 159)

Washington State Building

The Washington State building to be erected at the Exposition grounds for the 1915 Exposition will serve to convince the visitor to the fair of the growing importance of Washington as a center of culture, art and industry; able to take her place amongst the most enterprising of her sister states; ideally located, backed by San Francisco Bay, and fronting a circular court formed by four State and foreign pavilions.

Architecturally the exterior will be of a modified classic or, to be more explicit, modernized Italian renaissance. Being in the midst of so many elaborate structures where the low cost of construction permits the profuse use of ornament on the exteriors, and where repetition is so apt to appear and tire the eye of the visitor, the Washington building will rely for its strength in simplicity of line and well studied proportions.

One enters the building and is at once impressed with the classic yet restful influence of the Doric lobby. The color scheme of gray and white lends itself admirably to the interior detail, which closely follows that of the exterior.

Above the lobby and at each pavilion end there will be large ceiling lights treated with art glass. The center panel over the lobby will be circular in shape, with a diameter of thirty feet over the entire well opening to the ground floor. This, with the aid of the large grilled windows of amber cathedral glass, will throw a restful, cool light over the entire center of the building.

On one end of the first floor a moving picture theater accommodating over three hundred people will be installed, where the agricultural and industrial progress of Washington will be filmed.

The other end of this floor will be used primarily for a few picked exhibits and will, like the central lobby, be open to the second story ceiling light.

Passing from the main lobby up the open stairway, where at any point an unobstructed view can be had of the first floor, one comes to the second floor, which with the exception of the social hall, is again all open. From this floor a view may be had of all the lower floor over the heavy balustrades of the well openings.

The cornice and columns of the lower floor and well openings will be in Washington woods. The columns of the second story will all be of plaster. All the woodwork will be treated with waxed silver gray stain to permit the grains of the woods to show.

The social hall and ladies' and men's parlors are located on the second floor, where the visitor will find entertainment. Rooms are provided for matrons, ladies' rest rooms, and every convenience necessary.

Skirting the lobby will be commissioners' offices, public telephone booths, information booths and a post-office.

The building is planned to be of interest to visitors from the world over and at the same time a home for Washingtonians. All features have been carefully considered and is, in the opinion of all, a structure typical of the enterprising State of Washington.

A. F. Heide, the architect of this pavilion, has had previous experience in the planning of state exposition buildings having planned for the State of Washington its buildings at both the St. Louis and Portland expositions.

Mr. Heide is also preparing plans for the Washington building at San Diego, work on which will commence very shortly.

The Call-Post Building

The building is situated on one of the few so-termed island lots, namely, having a street frontage for each of the four facades, 264 feet on Jessie street and on Rose avenue and 68 feet on New Montgomery street and on Annie street, each of these two latter frontages having a prominent entrance to the office portion of the building, occupying the five upper floors.

The basement and two lower stories will be entirely occupied by the various newspaper departments, and fitted up expressly for that purpose. The pressroom, equipped at present for five presses and ample room for expansion, extends from the basement level up entirely through the first floor. The balance of the first story will be taken up by the business office and delivery departments, and the second story entirely devoted to the editorial and reporters' quarters, photo-engraving, etching, art and biographical departments, etc. The five floors above will contain two hundred and fifty large, well lighted, modern and fully equipped offices, all having street frontages communicating with the two main first-story entrances above mentioned, one on New Montgomery and the other on Annie street. These entrances, each consisting of a handsome two-story vestibule, communicate directly with passenger elevators, consisting of six high-speed electric machines, which elevators also communicate with the newspaper departments on second floor; with two special hydro-electric machines provided for those departments.

A special feature is made of the two main office entrances, being finished entirely in bronze and marble with a Caen stone treatment for walls and ceilings of the first story above the marble. The corridors in the various floors above are finished in a corresponding manner throughout; mahogany being used for the interior finish of offices.

The treatment of the exterior, as shown by the illustration, is in the Italian renaissance, in which the two end pavilions are emphasized by the fluted pilasters extending through three stories with Corinthian capitals supporting the entablature and main cornice at line of sixth floor. Above this the seventh story is given a lighter treatment surmounted by a secondary cornice and balustrade.

The two lower stories of the building consist of a series of rusticated pilasters filled in with plate glass and metal frames.

The third floor, acting as a base for the superstructure, is heavily rusticated with flat arched openings.

The color treatment of the exterior throughout will be in a gray stone with all carvings and enrichments of the same material.

The cost of the completed structure will run between $400,000 and $500,000.

Reid Bros., San Francisco, are the architects.

Careful Building Inspection

In the construction of the modern building there is positive need of rigid inspection. If time is taken to view carefully the work as erected, this necessity becomes at once apparent.

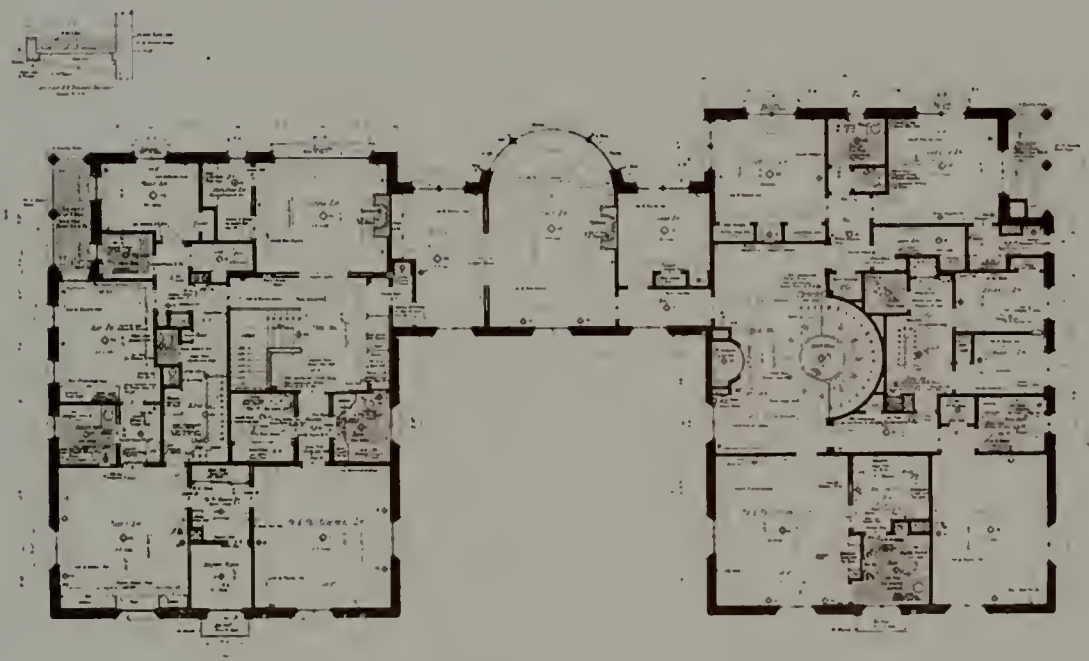
Where concrete work is used, too close watching cannot be had. The placing of the reinforcing steel should be accurate and the necessary amount of cement in no way reduced. There are many porous sections, especially in concrete walls, which do not measure up to a good standard and if a timid inspection is permitted concrete work falls far short of the calculations of the strength it is supposed to have.

The many uncertainties in this class of construction demands above all other buildings an inspection of the most rigid sort.

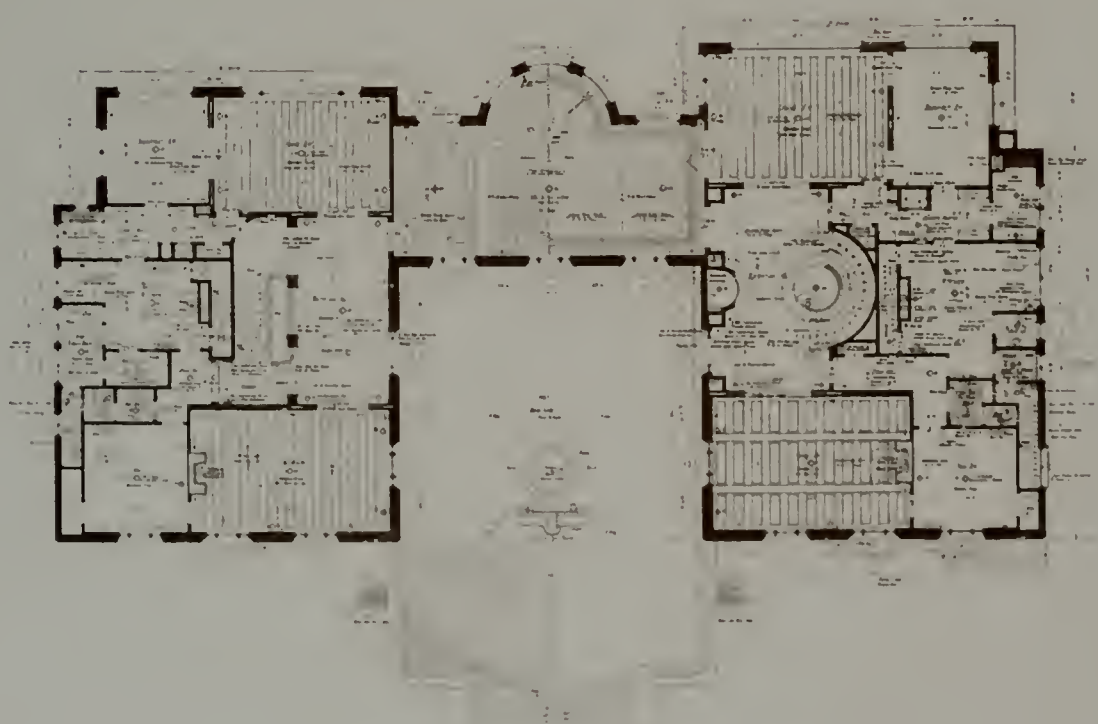
RESIDENCE · FOR · LOUIS SARONI · ESQ·

THE PACIFIC COAST ARCHITECT

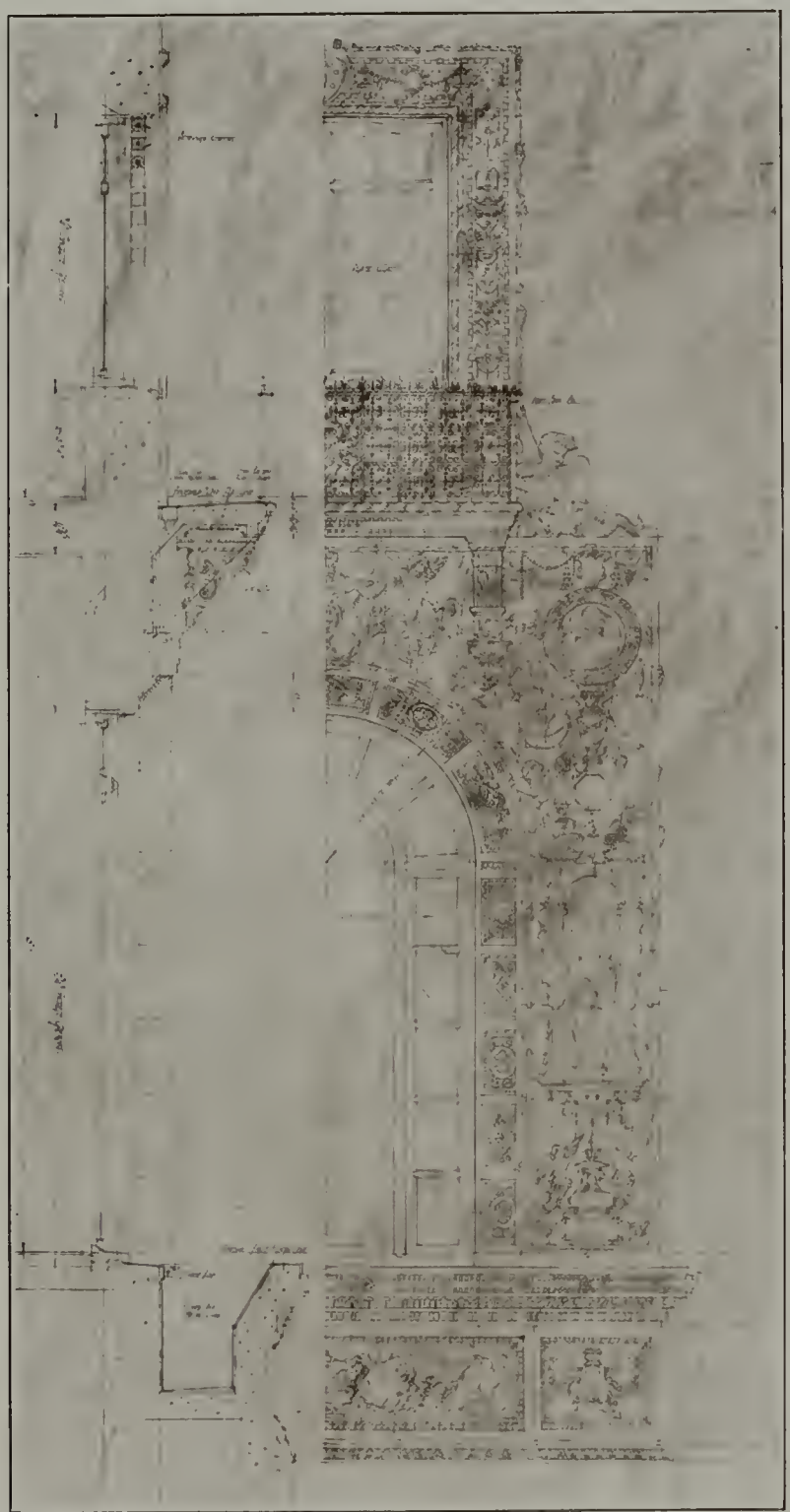
MACDONALD & MACDONALD ARCH'TS



Second Floor Plan, Residence for Mr. Louis Sarconi, Esq

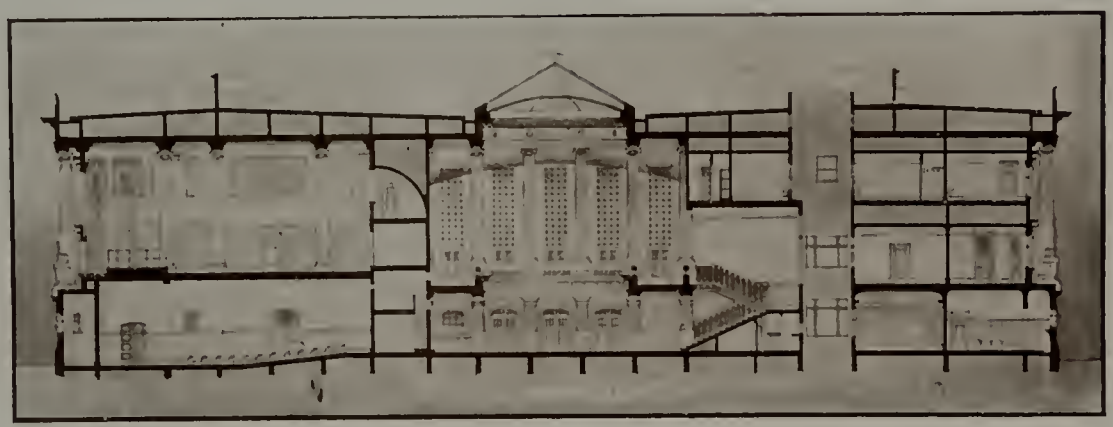


First Floor Plan, Residence for Mr. Louis Sarconi, Esq.
MacDougall & MacDonald, Architects & Engineers

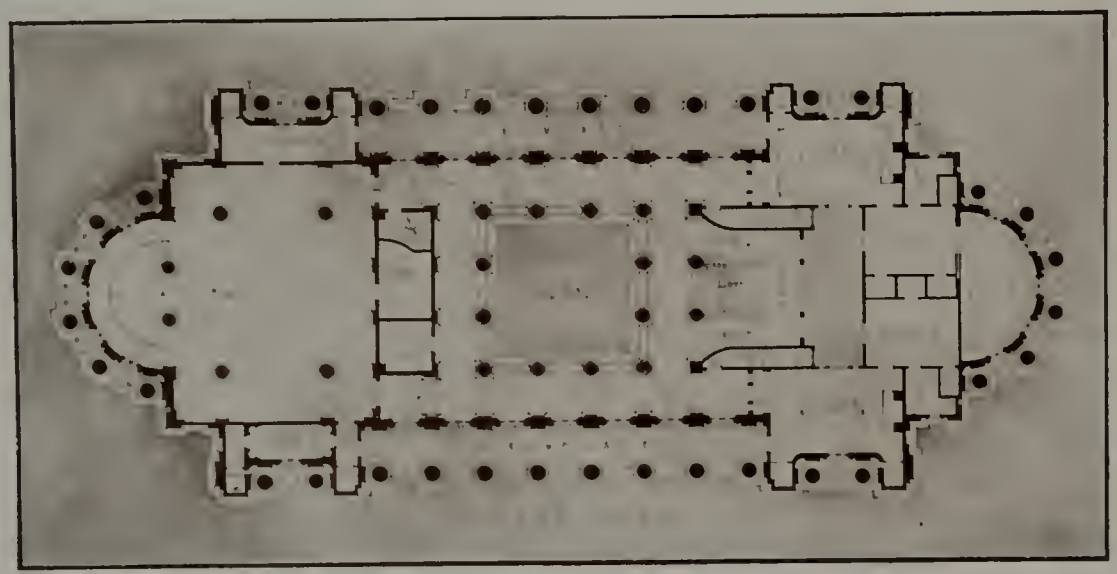


Detail of Motif, Residence for Mr. Louis Saroni, Esq.
MacDonald & MacDonald, Architects, San Francisco Photo, Gabriel Moulin

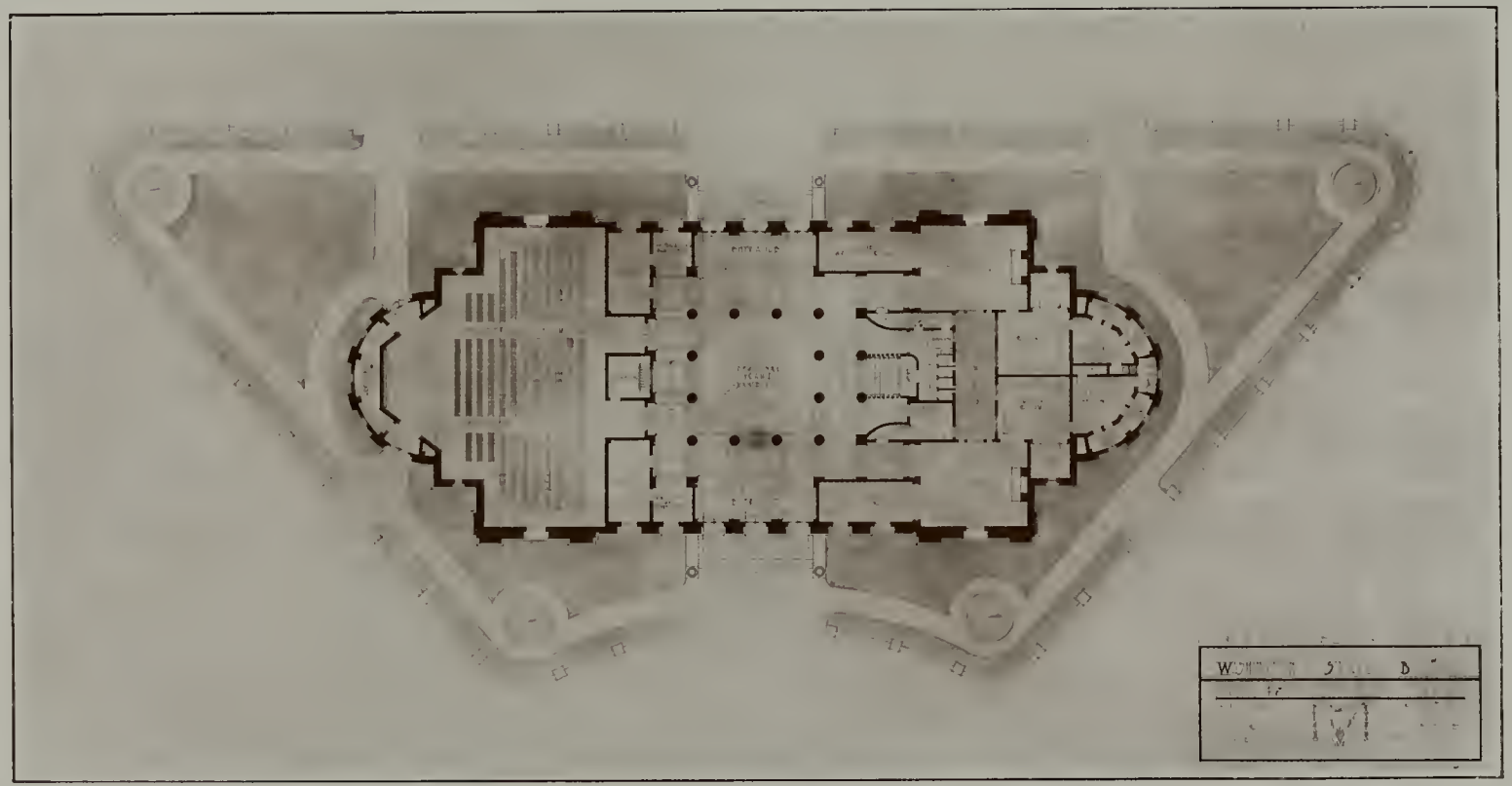
Architect's Model of Motif, Residence of Louis Saroni, Esq.
MacDonald & MacDonald, Architects, San Francisco
Photo, Gabriel Moulin



Longitudinal Section, Washington State Bldg., P.-P. I. E.



Second Floor Plan, Washington State Bldg., P. P. I. E.
A. F. Hoffe, Architect, San Francisco and Seattle



First Floor Plan, Washington State Bldg., P.-P. I. E.
A. F. Heide, Architect, San Francisco and Seattle

THE SEAL OF THE STATE OF WASHINGTON
1889

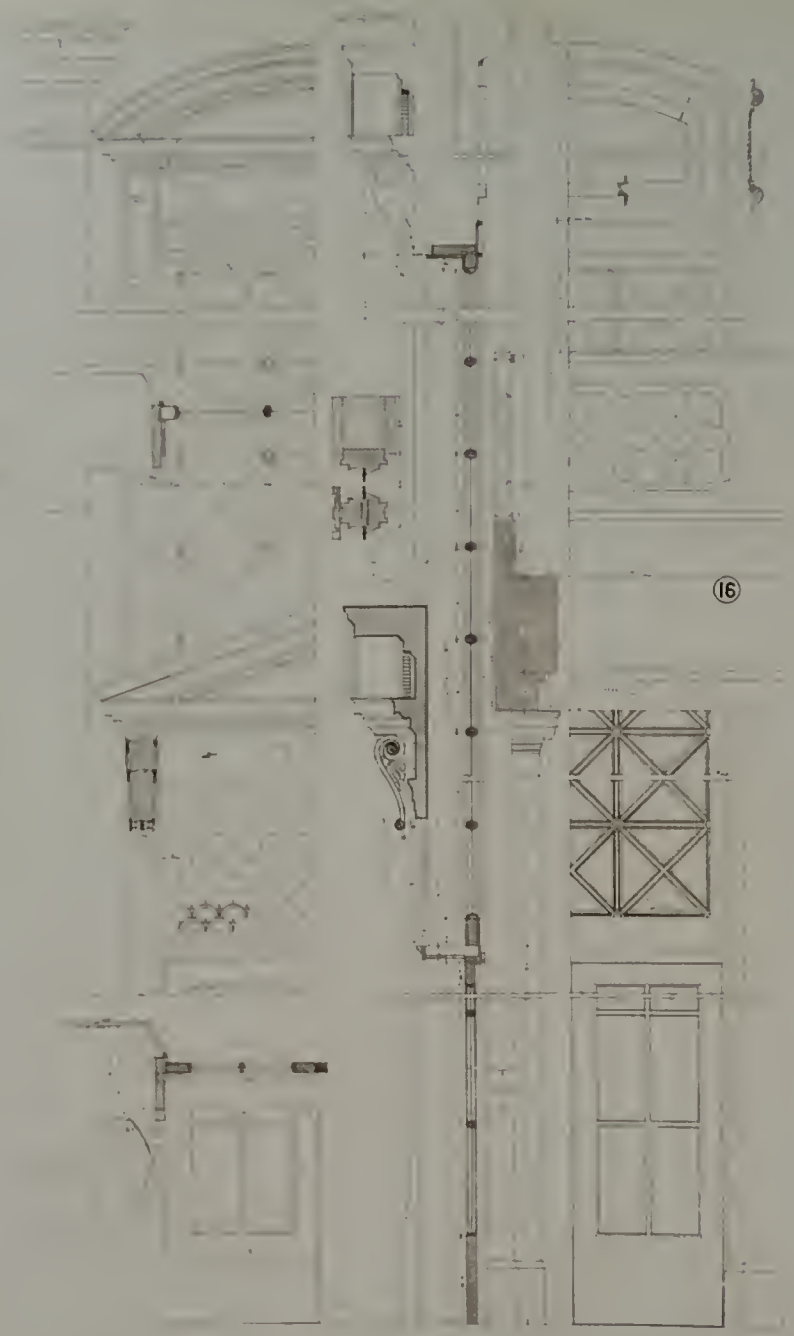
Original Drawings

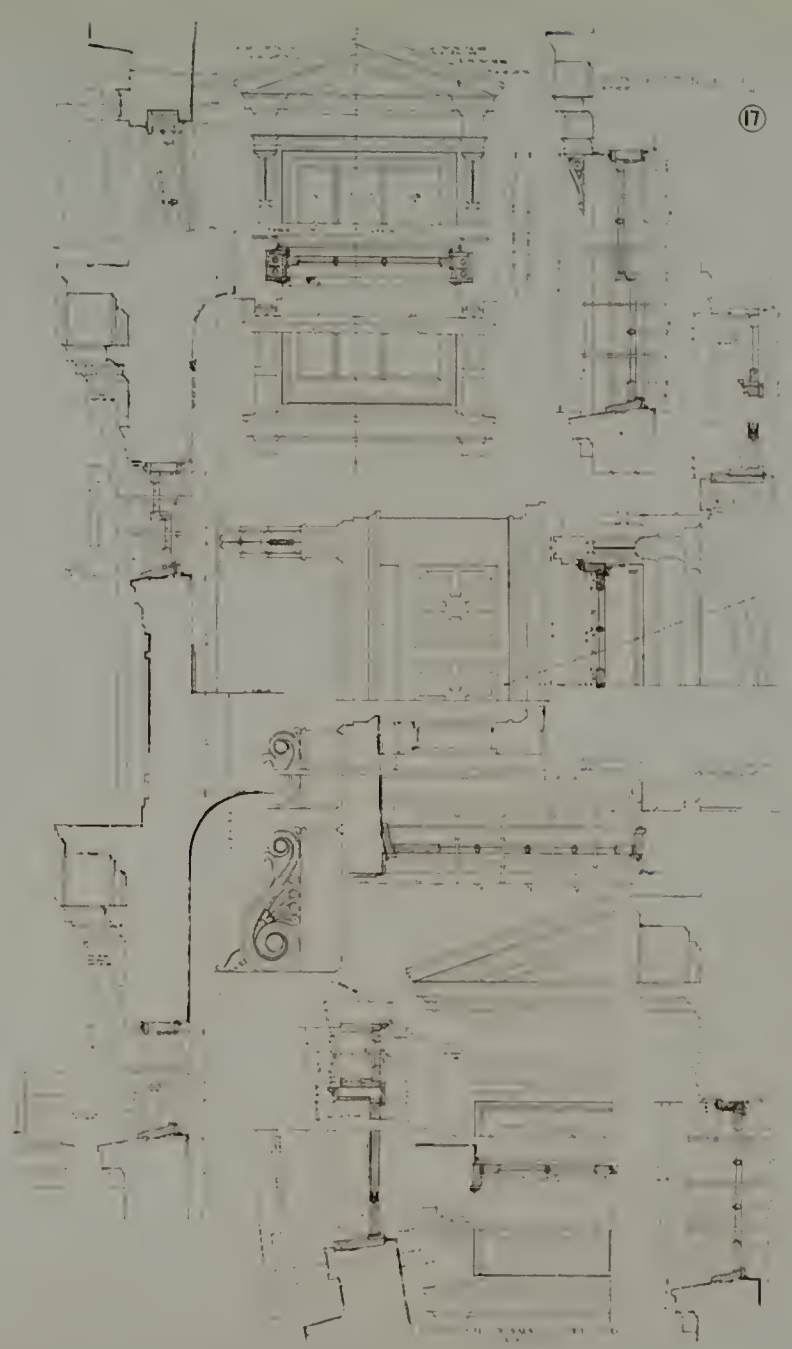
Washington State Building

Panama-Pacific International Exposition

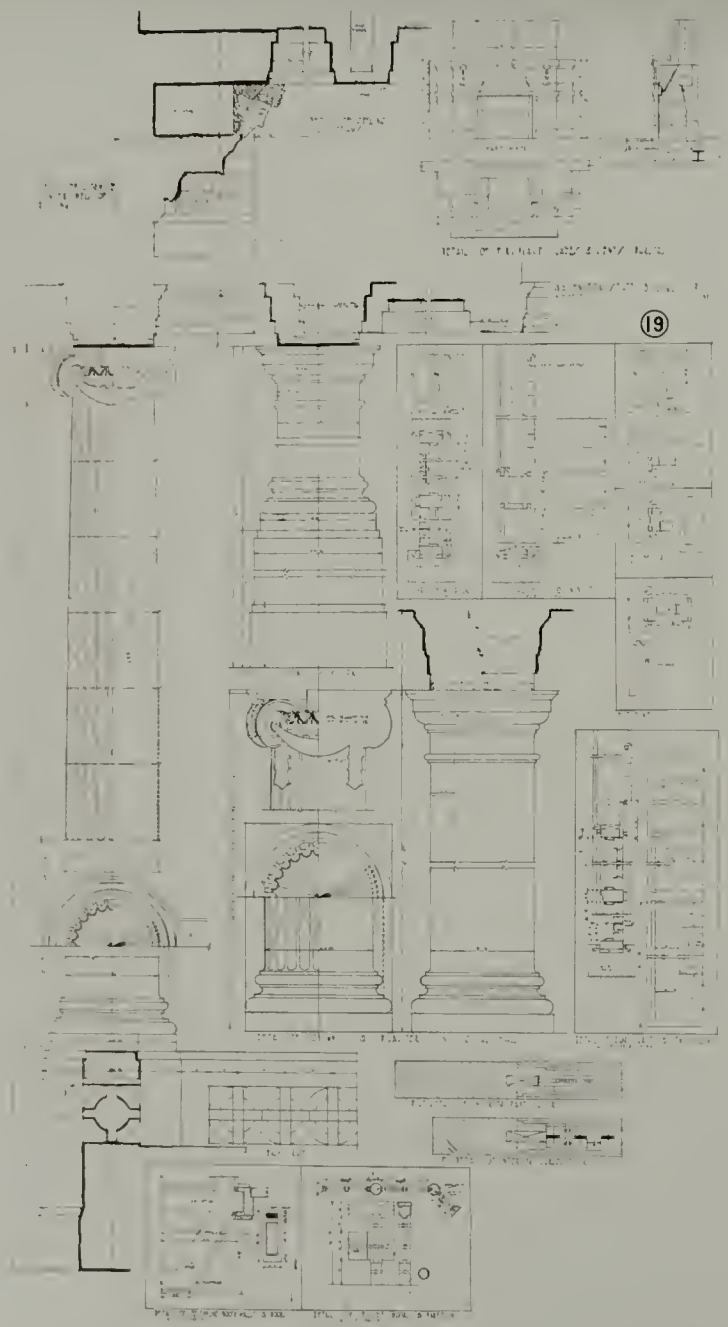
San Francisco—1915

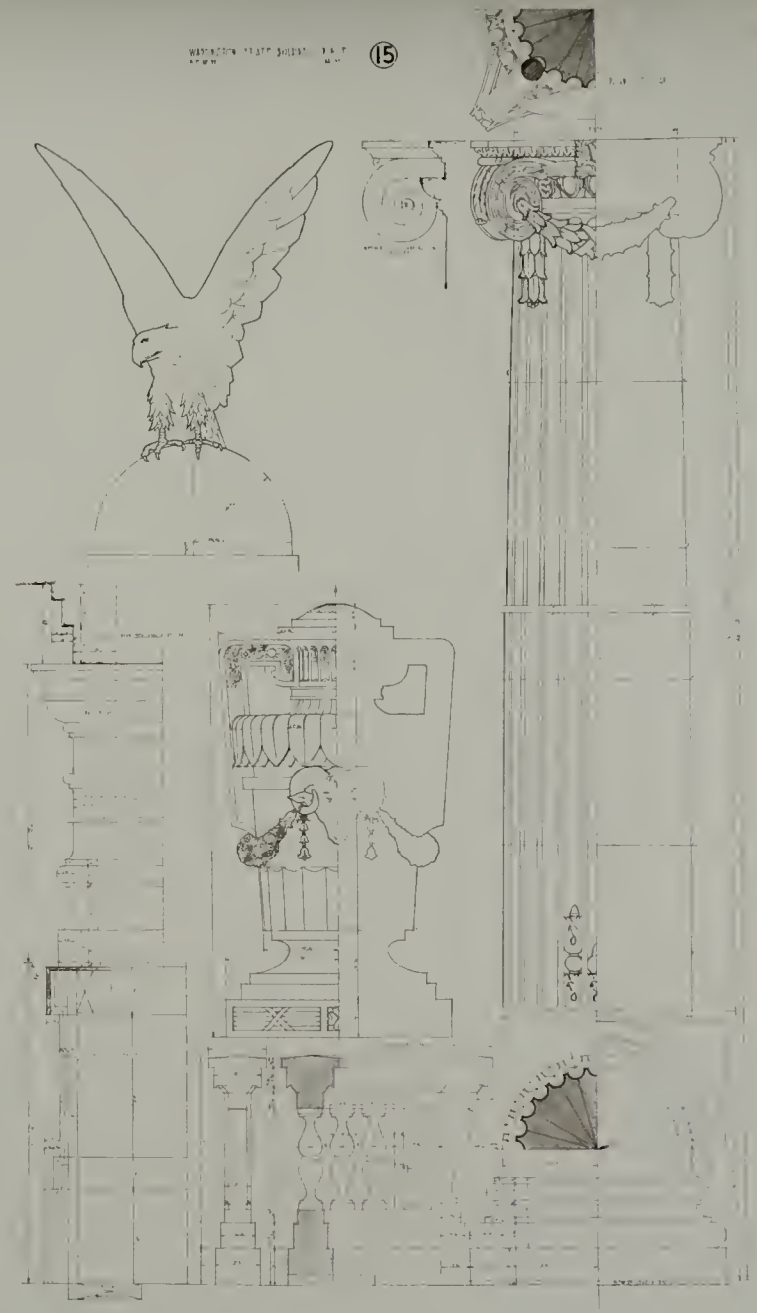
A. F. Heide, Architect,
San Francisco
and
Seattle





Scale ⅜" to the 1'0"
Working Details, Washington State Bldg., P P I E
A F Heide, Architect, San Francisco and Seattle





Scale $\frac{3}{8}$" to the 1'0"

Working Details, Washington State Bldg., P. P. I. E.

A. F. Heide, Architect, San Francisco and Seattle

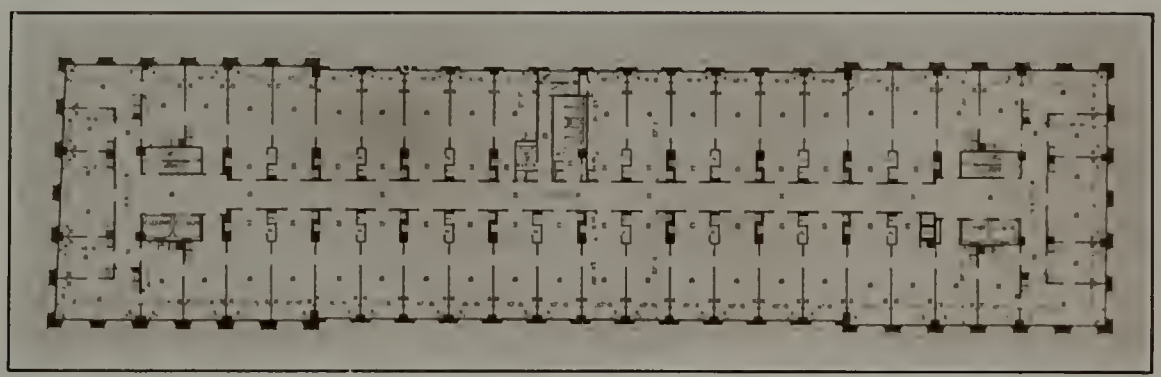
A NATURAL SKYSCRAPER

At Camp Meeker, on the Russian river, in Sonoma county, California, four redwood trees forming the angles of a square have been utilized as the corner supports for a seven story and roof garden structure.

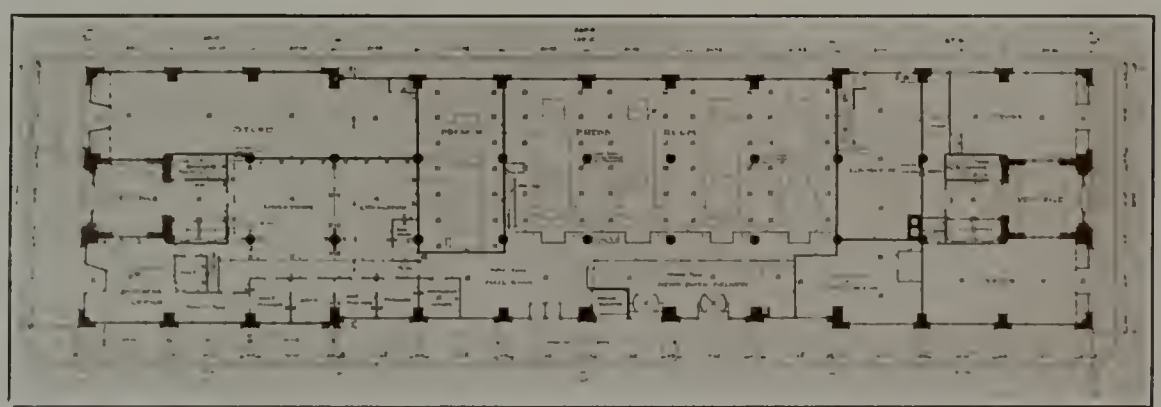
The unique and airy construction of this edifice will appeal to fresh air enthusiasts, as each floor appears to be well ventilated, with ample opportunity for rays of the sun, moon and stars to enter from all points of the compass.

Theoretically, as the present structure is carried up by the growth of the trees, additional floors will be added from the bottom, so that ground floor tenants of the present may not find themselves disadvantageously situated a few years later.

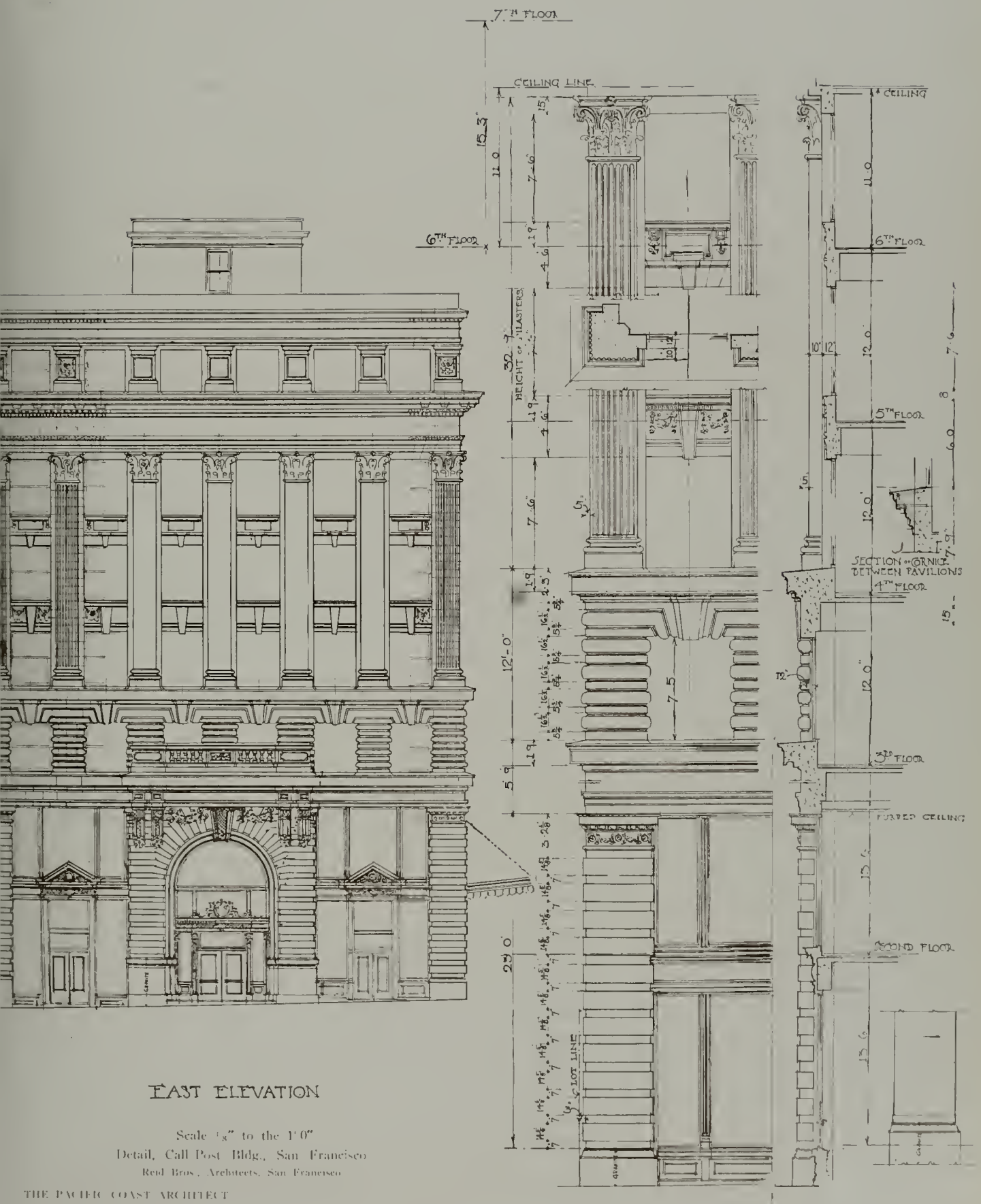
Building for the Call-Post, Sharon Estate Co., San Francisco
Reid Bros., Architects, San Francisco



Typical Plan of Office Floors, Call-Post Bldg., San Francisco



Plan of First Floor, Call Post Bldg., San Francisco
Reid Bros., Architects, San Francisco



EAST ELEVATION

Scale ⅛" to the 1'0"

Detail, Call Post Bldg., San Francisco

Reid Bros., Architects, San Francisco

"THE PACIFIC COAST ARCHITECT" is the official organ of the San Francisco Chapter of the American Institute of Architects.

San Francisco Chapter, 1881—President, G. B. McDougall, Russ Building, San Francisco, Cal. Secretary, Sylvain Schnaittacher, First National Bank Building, San Francisco, Cal.
Chairman of Committee on Public Information, William Mooser, Nevada Bank Building.
Chairman of Committee on Competition, Geo. B. McDougall, 235 Montgomery St.
Date of Meetings, third Thursday of every month; annual, October.

OTHER PACIFIC COAST CHAPTERS OF THE AMERICAN INSTITUTE OF ARCHITECTS.

Southern California Chapter, 1894—Vice-President, A. C. Martin, 430 Higgins Bldg., Los Angeles, Cal. Secretary, Fernand Parmentier, Byrne Building, Los Angeles, Cal.
Chairman of Committee on Information, W. C. Pennell, Wright & Callender Bldg., Los Angeles.
Date of Meetings, second Tuesday (except July and August), (Los Angeles).

Oregon Chapter, 1911—President, Morris H. Whitehouse, Wilcox Building, Portland, Ore.
Secretary, Ellis F. Lawrence, Chamber of Commerce Building, Portland, Ore.
Chairman of Committee on Public Information, Ellis F. Lawrence.
Date of Meetings, third Thursday of every month, (Portland); annual, October.

Washington State Chapter, 1894—President, Charles H. Alden, 513 Colman Bldg., Seattle, Wash. Secretary, Arthur L. Loveless, 513 Colman Building, Seattle.
Chairman of Committee on Public Information, Chas. H. Alden, 513 Colman Bldg., Seattle (till further notice send all communications to Arthur L. Loveless, 513 Colman Building, Seattle.)
Date of Meetings, first Wednesday (except July, August and September), (at Seattle except one in spring at Tacoma); annual, November.

Colorado Chapter, 1892—President, Georgge H. Williamson, 528 Majestic Bldg., Denver, Colo. Secretary, Arthur A. Fisher, 459 Railway Exchange Building, Denver, Colo.
Chairman of Committee on Public Information, Arthur A. Fisher, 459 Railway Exchange Bldg., Denver, Colo.
Date of Meetings, first Monday of every month (Denver, Colo.); annual, September.

THE AMERICAN INSTITUTE OF ARCHITECTS.
The Octagon, Washington, D. C.

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SAN FRANCISCO CHAPTER, A. I. A.

A special meeting of the San Francisco Chapter of the American Institute of Architects was held at Tait-Zinkand Cafe, on Tuesday evening, May 5th, 1914, for the purpose of tendering a banquet to Messrs. Chas. Gilbert and Paul P. Cret, and the Honorable James D. Phelan, jurors for the San Francisco Public Library Competition.

Messrs. Henry Bacon of New York; Charles H. Alden, President of the Washington State Chapter, A. I. A., and Kenneth MacDonald were also present as guests of the Chapter. The following members were present:

Geo. B. McDougall ..... President
Edgar A. Mathews ..... Vice President
Sylvain Schnaittacher ..... Secretary-Treasurer
Wm. B. Faville and Henry A. Schulze ..... Trustees

Applegarth, Geo. A.	MacDonald, Kenneth, Jr.
Bakewell, John, Jr.	McDougall, C.
Brown, Arthur, Jr.	Meussdorffer, C. A.
Cahill, B. J. S.	Meyer, Frederick H.
Coxhead, E. A.	Mitchell, Wm. Garden
Devlin, Leo. J.	Mooser, William
Dolliver, J. W.	O'Brien, Matthew
Donovan, John J.	O'Brien, Smith
Headman, August G.	Pissis, Albert
Hobart, Lewis P.	Polk, Willis
Howard, John Galen	Raiguil, Wm. Otis
Joseph, Bernard J.	Reid, James W.
Kelham, Geo. W.	Reid, Merritt J.
Kraft, Elmer Jerome	Righetti, Perseo
Lansburgh, G. Albert	Reid, John, Jr.
Lichtenstein, Milton	Schroepfer, Albert
Lofquist, John O.	Shea, Frank T.
Longchamps, Fred J. de	Vogel, E. J.

President Geo. B. McDougall presided and introduced the speakers, in whose honor the dinner was given.

Subject to approval,
SYLVAIN SCHNAITTACHER,
Secretary.

✧ ✧ ✧

SAN FRANCISCO CHAPTER, A. I. A.

The regular monthly meeting of the San Francisco Chapter of the American Institute of Architects was held at the room of the Chapter, 110 Lick Building, on Thursday afternoon, May 21st, 1914. The meeting was called to order at 4:10 o'clock by Mr. Geo. B. McDougall.

There were thirteen members present.

MINUTES.

The reading of the minutes of the regular meeting of April 16th, and the special meeting of May 5th, 1914, was, on motion duly made and seconded, dispensed with.

STANDING COMMITTEES.

Sub-Committee on Competition, A. I. A.

Mr. Mooser reported that the competition for the San Francisco Public Library had been decided since the last meeting, the design of Mr. Geo. W. Kelham having been selected by the Jury of Award. Mr. Mooser also stated that he had in preparation a written report which would be submitted to the Chapter at the next meeting, calling attention to numerous cases of participation in unauthorized competitions by members of the Chapter competing, and others acting in a judicial capacity.

MEMBERSHIP.

Mr. Louis Theodore Lenzen, having made the necessary application for Chapter membership, and having been balloted upon, Messrs. Schulze and Mathews were appointed tellers to count the ballots. Forty-nine ballots were received and counted and Mr. Lenzen was declared unanimously elected a Chapter member.

COMMUNICATIONS.

The following communications were received and ordered placed on file:

Telegram from D. Knickerbacker Boyd, Secretary A. I. A., congratulating the Chapter on its action in the matter of the Consulting Architects; from Egerton Swartwout, Chairman Committee on Government Architect, letter in re building for the Department of Justice in Washington, D. C., together with statement in circular form regarding same; from Sullivan Jones, member Committee on Contracts and Specifications, A. I. A., matters in re "Quantity Survey." Letter from the Louisiana Chapter, A. I. A., thanking this Chapter for its interest in the Jackson Barracks matter; from the St. Louis Chapter, A. I. A., the extending of an invitation to attend the coming Pageant and Masque to be given in St. Louis; from the Calgary Chapter of the Alberta Association of Architects, requesting information from the local Chapter on "Quantity Surveying." Letter from John Reid, Jr., acknowledging receipt of letter sent him; from the San Francisco Labor Council in re specifying products of the York Manufacturing Company; from C. H. Cheney, Secretary of the San Francisco City Planning Exhibit,

requesting collection to help defray expenditures made during the recent Exhibit; from the San Francisco Chamber of Commerce, in re the improvement of the Ocean Beach; from the American Federation of Arts, requesting name of delegate from the S. F. Chapter to the Convention to be held in Chicago; a copy of the "Quantity Surveyor" for May, and the Proceedings of the Eleventh Annual Convention of the Iowa Chapter of the A. I. A.

UNFINISHED BUSINESS.

There was no unfinished business.

NEW BUSINESS.

With reference to the communication from the Institute Committee on Government Architecture, Mr. Mooser made a statement relative to the matters contained in the communication; and on motion duly made, seconded and carried, the Secretary was directed to send a copy of the Institute Committee's statement to the California representatives in the Senate and House. Mr. Mooser's full report follows:

To the Members of the San Francisco Chapter, A. I. A.

Gentlemen: As a member of the Standing Committee on Government Architecture, I desire at this time to place before you a report just at hand prepared by the Chairman of the Committee, Mr. Edgerton Swartwout, of New York, in conjunction with President Sturgis. This paper treats with certain phases of the Government Architectural Work, and involves three firms of Architects who were declared the winners in three competitions for Government buildings to be erected in Washington, D. C.

I will read the report so that you may have the proper information, as it is earnestly requested that this Chapter, along with all Chapters, give its approval to the document and that the same be forwarded forthwith to all representatives in Congress.

I have also just received the report of the Supervising Architect at Washington and the report of the Public Buildings Commission on Government work; this latter report is a very full and exhaustive one and deals with all phases of the question of sites and building appropriations by Congress and the designing and erection of buildings. There is a majority and a minority report, the latter being sent in by the Postmaster General, Mr. Burleson; from the limited time in which I have had to read its contents it would seem that the minority report is the far better one in all respects, and especially so as it relates to the architectural side of the question. Neither of the reports are very definite in their findings, and it would seem not a very difficult task at arriving at some proper solution of the subject.

The two reports treat with the standardization of plans for at least post offices, but Mr. Burleson's report at least qualifies this scheme with some degree of thought to architectural effects.

I hope that at our next meeting it may be possible to discuss the matter fully, so as a member of the Committee on Government Architecture, I may have the Chapter's ideas and receive its suggestions.

I had the pleasure last week of meeting another member of this committee, Mr. Hugh Roberts, of New Jersey, Architect for his State's building at the Exposition; in discussing the subject as to a course of procedure and the kind of a bill the Institute might father to take the place of the Tarnsey Act, it would appear that the ideas of the New Jersey Chapter expressed by Mr. Roberts are very much in accord with the sentiments of at least the majority of our members, and it is to be hoped that the committee will find a solution of the subject which will be of service to you, and at the same time give the government what we, as Architects, deem a proper mode of securing the best results in handling its buildings.

Respectfully submitted,

WILLIAM MOOSER.

With reference to the communication from the City Planning Exhibit, the Chapter agreed to donate an additional five ($5.00) dollars to help cover the deficiency.

The general idea of the improvement of the ocean beach, as proposed by the Chamber of Commerce was indorsed by the Chapter, and the Secretary was directed to so notify them.

ADJOURNMENT

There being no further business before the Chapter, the meeting adjourned at 5 o'clock.

Subject to approval,

SYLVAIN SCHNAITTACHER,
Secretary

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SOUTHERN CALIFORNIA CHAPTER A. I. A.

The Seventy-second meeting of the Southern California Chapter of the American Institute of Architects was held at the Hollenbeck Cafe, Los Angeles, California, on Tuesday, May 12, 1914.

The meeting was temporarily called to order at 7:40 P. M. by Vice President A. C. Martin who introduced Professors J. H. Montgomery, and Arthur W. Nye of the University of Southern California.

Professor Montgomery delivered an interesting lecture illustrated by stereopticon views on "Electricity and Fire Hazard." This lecture was supplemented by additional commentations from Professor A. W. Nye.

At the close, Professors J. H. Montgomery and Arthur W. Nye were tendered the Chapter's hearty vote of thanks on motion made, seconded and duly carried.

At 8.50 P. M. the Chairman called the meeting to order for the usual procedure of the Chapter's business. The following members were present:

1. A. L. Acker,
2. Joseph J. Blick,
3. A. M. Edelman,
4. Lyman Farwell,
5. Irving J. Gill,
6. Elmer Gray,
7. John C. Hillman,
8. Frank D. Hudson,
9. J. W. Krause,
10. John P. Krempel,
11. A. C. Martin,
12. H. H. Martin,
13. S. B. Marston,
14. B. M. Morris,
15. O. W. Morgan,
16. S. T. Norton,
17. Robert H. Orr,
18. Fernand Parmentier,
19. H. M. Patterson,
20. T. F. Power,
21. A. F. Rosenheim,
22. Aug. Wackerbarth,
23. Albert R. Walker.

As guests of the Chapter were present Professors J. H. Montgomery and Arthur W. Nye, of the University of Southern California; John D. Bowler of the Builder and Contractor; H. K. Hensley and Wm. E. Prine of the Southwest Contractor.

The minutes of the Seventy-first meeting of members were read and adopted.

For the Board of Directors the Secretary reported that one meeting had been held on Tuesday, May 12, 1914, and that the Directors at this meeting were instructed to recommend to the Chapter the appointment of a special committee to take proper action in the case of the professional charges preferred against J. Martyn Haenke, member of this Chapter, as the Chapter's committee on Ethics and Practice, which had been appointed to investigate and report on this case, had failed to arrive at conclusions.

In compliance with this recommendation, the Chairman appointed A. F. Rosenheim, Elmer Grey and John P. Krempel as a special committee of investigation in the Haenke matter to report for the following Chapter meeting.

For the Committee on Civic Improvements, Elmer Grey and A. F. Rosenheim reported partial progress toward the forming of a City Planning Commission in the future.

For the Chapter's Entertainment Committee, John P. Krempel reported that A. M. Edelman, member of this Chapter, would present an illustrated lecture on European Travel for the following Chapter meeting, and for the first meeting after the summer vacation, the Chapter would have a lecture from Mr. Octavius Morgan.

Communications were next read as follows:

A postal card from Marseilles, France, from Octavius Morgan, wishing to be remembered to the Chapter members.

From the A. I. A. Sub-committee on Quantity Survey, of the Committee on Contracts and Specifications with reference to the appointment by this Chapter of a Chapter Committee on Quantity Survey. The advisability of this request being obvious, the Chairman announced that he would appoint the Committee in due time.

From the Master House Painters and Decorators Association, of Los Angeles, acknowledging communication from this Chapter advising of the Chapter's adoption of the "Standard Painting Specifications."

From the Municipal League, of Los Angeles, acknowledging this Chapter's co-operation in reference to the recent presentation of the New York City Planning Exhibit in Los Angeles, and urging this Chapter's future co-operation toward the forming of a proper commission and laws on City Planning.

From the Secretary of the San Francisco Chapter, American Institute of Architects, requesting certain changes in the minutes of the Seventy-first meeting of members of this Chapter, with reference to the attitude of the San Francisco Chapter in connection with Mr. Vinson's proposition regarding Architectural League Exhibits, also stating that the San Francisco Chapter was desirous of maintaining a neutral attitude in the matter of Architectural Exhibits to be held during the period of the 1915 Fair. The Secretary announced that he had made corrections in the Chapter's minutes pursuant to the request of the San Francisco Chapter.

From the St. Louis Chapter A. I. A. extending to the members of this Chapter an invitation to attend the Pageant and Masque to be given at Forest Park, St. Louis, May 28th to 31st, 1914.

From the Los Angeles Chamber of Mines and Oil, inviting the members of this Chapter to an excursion to Arizona and Imperial Valley to be held in the near future.

From the Boundary Stone League, a request for this Chapter to give its endorsement to a petition to the Government of the State of California and one to the U. S. Government at Washing-

ton, D. C., with reference to the establishing of historic mile stones, and historic county boundary stones upon the Pacific Coast-wise Highway from San Diego to the Oregon state line, and upon all transcontinental Federal Highways reaching the Pacific Ocean through California, Oregon, Washington, Nevada, New York and Texas.

The Chapter's endorsement was unanimously granted on motion made by Frank D. Hudson, seconded by A. F. Rosenheim, and duly carried.

The Chairman next announced the appointment of the following committees:

On Institute membership:
A. M. Edelman, Chairman;
H. M. Patterson,
J. C. Hillman.

On Quantity Survey:
O. W. Morgan, Jr., Chairman;
S. B. Marston,
F. T. Power.

Revision of the Chapter's constitution and by-laws:
A. C. Martin, Chairman;
S. T. Norton,
Fernand Parmentier.

After various discussions, the Secretary was instructed to forward a night letter to Octavius Morgan, at present in Washington, D. C., urging Mr. Morgan to take up the matter of the 1915 Institute convention at Los Angeles, with the President and Board of Directors of the Institute.

The Secretary was instructed to communicate with the Secretary of the Institute requesting application blanks for Institute membership for distribution to Chapter members.

The meeting adjourned at 10:10 P. M.

FERNAND PARMENTIER, Secretary.

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OREGON CHAPTER, A. I. A.

Meeting held April 16th, 1914, at the University Club, Portland, Oregon, was called to order by Vice-President Doyle in the absence of President Whitehouse.

The following members answered the roll call: Messrs. Jacobberger, Smith, Fouilhoux, Mayer, Lazarus, Patterson, Williams, Beckwith, Holford, Doyle, Thompson and Lawrence.

Mr. Fouilhoux moved and Mr. Thompson seconded that the minutes of the last meeting be accepted as printed. Motion carried.

Minutes of the Executive Committee meeting held April 2nd, read and approved.

REPORTS OF COMMITTEES.

Legislative Committee, Mr. Williams, Chairman.—"The undersigned, Chairman of your Legislative Committee, begs leave at this time to call your attention to the publication in The Oregon Building Record of some of the decisions of the Board of Appeals that have been rendered since the first meeting of said board, and to the fact that those published in the Record were but a small minority of the decisions that have been rendered by them.

All of the decisions rendered by said board should be published, to the end that each and every member of the Chapter may be conversant with each and every proceeding of the board since its inception into office." Ordered filed.

Committee on Building Laws, Mr. Fouilhoux, Chairman—"The undersigned, Chairman of the Committee on Building Laws, begs to submit the following report: No meeting of our Committee has taken place since the last meeting of the Chapter. I took up with Mr. Ion Lewis, Chairman of the Board of Appeal, the question of making public the decisions of the Board, and was informed by Mr. Lewis that owing to lack of funds they were unable to do any printing or mailing of these decisions. At his suggestion I took up the matter with the Inspector of Buildings, requesting him to arrange with either the Oregon Building Record or the Portland Daily Abstract for the publication of these decisions. As the members of the Chapter may have noticed the publication of these decisions has started in the Oregon Building Record." Ordered filed.

SPECIAL COMMITTEES.

Rose Festival Committee—Mr. Mayer reported: "Your committee upon the Rose Festival begs to report that the drawings mentioned in its last report, and which embodies the ideas of this committee, were given to Mr. Curry, representing the Rose Festival Committee. A rough estimate furnished by the Chicago Costume House, was given with the drawings. This estimate showed that the scheme, as presented, could be executed for approximately $8500, which is well within the sum of $10,000 that was to be allowed. Mr. Curry promised that the plans would be presented at the next regular meeting of the Rose Festival Committee and a report of its action sent to your committee. Nothing further has developed."

Ordered filed.

BALLOTING.

Vice-President Doyle appointed Messrs. Beckwith & Williams as Tellers, who reported, after counting the ballots, that Mr. Ion Lewis was elected to the Board of Trustees to succeed Frank Logan, resigned.

READING OF COMMUNICATIONS.

Letters from Rose Festival Auxiliary and Rose Festival Association, asking Chapter to participate in the daylight parade were read. Mr. Williams expressed himself as favoring the Institute and Architectural Club joining hands in a float for the parade. Mr. Thompson moved and Mr. Fouilhoux seconded that Mr. Williams be appointed Chairman of a committee of his own selection to confer with the Architectural Club on the subject and refer the matter back to the Executive Committee for action. Motion passed.

Copy of advertisement explaining functions of an architect as published by the Colorado Chapter of the A. I. A. was read. Mr. Mayer moved and Mr. Thompson seconded that the advertisement be referred to the Committee on Public Information to revise and to publish if deemed advisable. Secretary was instructed to include the advertisement in the minutes in order to reach all members of the Chapter. The advertisement is as follows:

"An architect's professional service to his client means that he must be so constituted that the creative faculty will be uppermost, as his duties lie primarily along these lines; to design or create, to hold ideas into form and color and demonstrate by drawings and renderings all such ideas. He must be prolific of suggestion as to modern and up-to-the-moment improvements and equipments for buildings of any and all types. To perfect himself in all these matters requires years of careful study and practice. He must also be able to execute, direct and construct these ideas, and his supervisions of work during execution is of great importance, as without his sympathetic attention to detail no completed work can be said to bear the stamp of individuality. He must visit shop and studio where various works that are to become parts of the structure are in course of preparation, and by careful criticism and instruction at first hand, get the best of the mechanic's or artisan's efforts.

His knowledge of all the building trades must be broad and accurate. A modern structure, however modest, is not unlike a human organism; having its skeleton or frame, its nerves and arteries or pipes and conduits, its drainage, its nerve system or electric wires, its finish that clothes the frame and lastly, its color, that important item that marks the consummation of the particularly ideal.

How can an architect prove a benefit in a building operation, large or small?

Firstly—He makes comprehensive drawings and specifications, being in all things practical, structural and ornamental. Secondly—He is enabled through these instruments to procure competitive bids, or proposals, from reliable contractors, thus enabling an owner to secure the best at the least cost, thus saving in most cases, all, if not more, than the amount of his fee. Third—Having comprehensive plans and specifications, all questions of dispute are readily adjusted, if such disputes should arise; he is the third party to any such controversy and absolutely unbiased in opinion. Fourth—All payments must receive his sanction; thereby throwing an absolute safeguard around the owner in all financial transactions. No reasonable person is satisfied with a druggist's suggestions for remedying his bodily ailments. He promptly engages the trained man, the physician or surgeon. No reasonable person would attempt to argue his own brief before a court of law. He employs the professional man, the lawyer.

Therefore, why not employ an architect? The problems involved at this day and age of the world in building improvement are just as complex and present as many difficulties to the layman as any of the above noted conditions and certainly if the investor or the home builder is to avoid difficulties or disaster, then the trained professional man, the architect must be retained."

Letter from Mr. Whitaker in reference to State License Laws, etc., was referred to the Legislative Committee. Mr. Williams spoke upon the difficulty of passing such a law at Salem and spoke for the concentration of effort on one bill, preferably that creating the State Architect's office.

Letter from Julius Franke, Chairman of Committee on Fire Prevention of the Association was ordered filed.

Letter from President Foster of Reed College requesting the Chapter's co-operation with the Portland 1915 Conference, to be held at Reed College in May, referred to the Committee on Public Information with power to act.

Standard form of competition programme, architectural competitions, Constitution and By-laws of the American Institute of Architects, etc., received by the Secretary. The Secretary was instructed to secure additional copies of the documents for distribution among the Chapter members.

Letter from Mr. Medary of the Competition Committee of the Institute, requesting the arguments in favor of the Oregon Chapter's action in favoring competitions for public buildings costing

over a certain sum, referred to Competition Committee of the Chapter for answer

UNFINISHED BUSINESS.

Employment of architect on Inter State Bridge was discussed Committee on Publicity instructed to publish the fact if an architect had been retained.

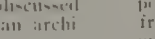
NEW BUSINESS.

Mr. Thompson moved and Mr. Holford seconded that the Secretary be instructed to get figures for printing the schedule of charges as approved by the Chapter, submitting them to the Executive Committee with power to act.

Motion passed.

Mr. Jacobberger asked about the progress of the new building code, especially that portion modifying the fire-proof restrictions on School House buildings as purported to be requested by the School Board and County Commissioners. Mr. Fouilhoux responded.

There being no further business the meeting adjourned.



WASHINGTON STATE CHAPTER, A. I. A.

The May meeting of the Washington State Chapter of the A. I. A. was held Wednesday evening, May 6th, at the College Club, preceded by dinner, 17 members being present.

A Chapter Committee on Quantity Survey was appointed, consisting of Bebb, Chairman, Willcox and Stephen.

The special committee appointed to meet with the Charter Revision Commission reported that after hearing the arguments of the committee, the Commission had decided to retain the Board of Appeals in the new charter.

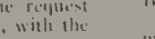
The committee appointed to co-operate with a joint committee of the Fine Arts Society and the Municipal League reported that the Charter Revision had decided to incorporate a provision for a Fine Arts Jury in the new charter.

The question of the construction of mill buildings in the first Fire District was referred to the Ordinance Committee.

A committee was appointed to devise a form of notification to manufacturers who send out trade catalogues which do not conform to standard sizes, that such catalogues are consigned to the waste basket. The Secretary was instructed to notify the Secretary of the Institute that such action had been taken with the request that he notify the Secretary of each Chapter concerning it, with the suggestion that they take similar action.

After discussion of the report of the committee which had under consideration a scheme to supply the public with stock plans of low cost houses at a trifling cost, a committee was appointed to consider ways and means to put such a plan in operation, to report at a later meeting.

ARTHUR L. LOVELESS, Secretary.



COLORADO CHAPTER, A. I. A.

The regular monthly meeting of the Colorado Chapter of the A. I. A. was held at the Shirley Hotel at 12:30, May 4th, 1914. The meeting was combined with a special luncheon and the following members were present: Messrs. Williamson, H. W. Baerresen, Harmon, Biscoe, Marean, Manning, Cowe, Bettcher and W. E. Fisher. Mr. Erwin and Mr. Henry Read were also present as guests of the Chapter. The meeting was called to order by the President, George H. Williamson.

MINUTES.

The reading of the minutes of the April meeting, also the special April meeting, was suspended, copies having been sent to all members of the Chapter.

STANDING COMMITTEES.

Mr. Bettcher reported an interview with the Plumbing Inspector, who stated that he considered the present plumbing ordinance as entirely satisfactory. He also interviewed Mr. George E. Smith, who offered his services for the work in the revising of the ordinance.

UNFINISHED BUSINESS.

There was no unfinished business from the previous meeting.

COMMUNICATIONS.

The following communications were received: Letter from Mr. William Cowe, inquiring of the Chapter regarding the practicing of architecture of the Building Inspector, also a complaint regarding the notice issued from the Secretary's office complaining about the poorly printed reports and notices, also regarding the Code of Building and Builders suggested by Mr. Baerresen. Three letters from Mr. MacLaren regarding the competition of the Colorado Building of the Panama Pacific Exposition. Letter from I. K. Ackerman of New York regarding the Commission on the height of buildings of New York, together with a report of the investigation on the subject. Letter from the Denver Chamber of Commerce offering further information for the competition for the Panama Pacific Exposition. Letter from H. D. Hammond, Director of Works on the Panama Pacific Exposition, regarding the cost of buildings built of staff. Letter from Mr. R. S. Roeschlaub asking for Chapter reports of our monthly meetings. Letter from S. W. Jones asking for a committee on Quantity Survey as recommended by the last Institute Convention.

ADDRESS BY MR. READ.

Mr. Williamson, in introducing Mr. Read, referred to Mr. Read's public service which has been given to our city so unstintedly and without remuneration. The benefits which the city has derived from his splendid service will grow from year to year. Mr. Read then addressed the Chapter, giving an outline of the work of the many problems of our Civic Center. The work on the Civic Center began in 1905, the movement having been started by the Art Commission, and it was decided to see what could be done towards beautifying that portion of the city at the intersection of Broadway and Colfax avenues. Mr. Robinson, the landscape architect, was called in as an expert in 1906 and recommended the clearance of a space from the courthouse to the capitol, and prepared preliminary studies for this proposed Civic Center. Two difficulties, however, had to be overcome. One was the fact that the two buildings were placed at right angles, and another was the large expense which would be incurred in condemning and buying the valuable property between these two buildings. The Art Commission also recommended the bonding of the city with 50 year bonds. It was defeated by the people. The Art Commission, however, was not discouraged and was generously supported by some of the architects and kept up this work for over six years, financing it themselves through subscriptions and without cost to the city.

About this time Mr. McMonnies arrived in Denver to prepare the preliminary work for the Pioneer Monument, corner of Colfax Avenue and Broadway, and he suggested utilizing the property directly west of the Capitol for the Civic Center. This plan was finally decided upon and Mr. Olmsted, with Mr. Brunner as an associate, were retained as landscape architects to design the Civic Center, which is now becoming a reality, and the Park Commission is now proceeding with the planting of groves of trees on the Broadway side of the Civic Center.

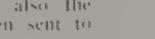
Mr. Read also offered some valuable suggestions regarding the proposed new building ordinance. He referred especially to the smoke nuisance and suggested that all plans for buildings, involving heating plants, should be passed upon by the smoke inspector and also by a board of unpaid commissioners of heating engineers to pass on this work. He expressed the opinion that a large amount of our smoke nuisance was due to the forcing of plants on account of the boilers being undersized and he maintained that boilers of ample capacity would reduce the amount of smoke very largely. He also referred to the new billboard ordinance and also advised that no billboards should be allowed on buildings unless they were of fireproof or slow burning construction, as they were not only a menace to the public safety, but they also ruined the appearance of some of Denver's most attractive buildings. He regarded the new billboard ordinance as a most excellent one.

ADJOURNMENT.

The Chapter then adjourned at 3 o'clock.

Subject to approval,

W. E. FISHER,
Acting Secretary.



Largest Manufacturer of Elevators

In 1853 Elisha Graves Otis began building hand power and later steam power elevators, in a small shop on the bank of the Hudson River, in Yonkers, N. Y. In 1868 Otis Brothers & Company was organized, and two years later began the erection of a new and larger factory. This factory consisted of a four-story brick building about 40x100 feet, and a small outbuilding. The former building still stands as one of the shops of the present works.

As the steam power, and later the hydraulic elevator, was developed and perfected by Otis Brothers & Company, a rapidly increasing volume of business resulted and frequent additions to the plant became necessary. In the early nineties, when electricity as a source of power began to come into general use, and a demand for electrically operated elevators had been created, the company's engineers and inventors turned their

attention to this new field. Success met their efforts, and during the next several years a rapidly increasing proportion of the company's product was of the electric type. The early Otis electric elevators were all of the worm gear drum type, and were operated by Eickemeyer bi-polar motors. The demand for electric machines led to the organization of the Otis Electric Company and the erection and equipment of a large five-story brick electric shop across the street from the elevator factory.

Original Yonkers Works of The Otis Elevator Co

In 1898 the Otis Elevator Company was organized, and within the next few years the electric and the elevator departments were consolidated. With the phenomenal development and prosperity of the country at this period came the constantly increasing demand for Otis elevators of all types, whose merits have been recognized for years as the standard of the world. In addition to the manufacture of its perfected type of elevators, the exploitation of the escalator was begun. During the last decade much additional ground area has been acquired for the Yonkers works. At present the Yonkers works are by far the largest and best equipped elevator plant in the world. Its product has been brought up to the highest possible state of perfection. About 150,000 square feet of ground are under roof, and the floor area exceeds 360,000 square feet.

The works are located within a few hundred feet of the city hall and business center and of the main station of the New York Central railroad. The main line of the railroad separates the works from the docks on the Hudson River front. Cars for outgoing freight stand on a siding at the doors of the shipping department. A siding for incoming freight runs into the works yard, where the freight is unloaded by traveling cranes upon cars of the works industrial railway system. Coal, sand, lumber, etc., are unloaded at the company's docks located but a few hundred feet from the main part of the plant.

In addition to the Yonkers works, large manufacturing plants at Buffalo, Harrison, N. J., Chicago, Hamilton, Ontario, Houston, Texas, San Francisco, Quincy, Illinois, Berlin, London and Paris form part of this organization.

Returning to the progress of the elevator industry in general, since the day when Jack and Jill had the difficulty with the pail of water because there was no elevator available, there have been continuous efforts to improve upon the methods of transporting goods and people from one level to another. As might be expected, it has required much more ingenuity to satisfactorily elevate the latter than the former. We know that freight hoists were in use some two or three centuries B. C., but no passenger lift appeared until about eight centuries later, and then about one thousand years after that we find a record of not more than one or two isolated instances of the use of apparatus for hoisting people. The early devices were operated by human power, this being succeeded by the simplest form of hydraulic equipment in which a ram supporting or carrying a platform was worked up or down by the admission or ejection of water from a closed cylinder.

Following this type, in the hydraulic line came the geared hydraulic machines, in which the cylinder was retained but the ram became a piston, traveling but a portion of the distance the car had to run, cables being introduced to connect the piston and car, these cables passing around multiplying sheaves to give the necessary car travel. The early power elevators, other than the hydraulic, employed the winding drum for the cables, this machine being driven through the medium of spur gearing, the gearing being driven from a line of shafting by means of a belt, or by steam engine, without the use of line shafting. The spur gear engine was followed by a machine employing a worm and gear drive, eliminating the fault inherent in the spur gear machine, namely, the danger of the load on the car being too great to be sustained by the power available to drive a machine, resulting in a runaway and smashing of the car at the bottom of the hoistway.

Elisha G. Otis exhibited at the World's Fair in the Crystal Palace, New York, the first elevator which employed a device for preventing fall of the car in case the cables broke. This marked the real beginning of the elevator as a passenger conveyor, although it was some years before the business developed to considerable proportions. Mr. Otis was a very conservative and conscientious manufacturer, and for a considerable time made a practice of not entering into one contract until the last one taken was completed to everybody's satisfaction. Safety devices to prevent the

Present Yonkers Works of The Otis Elevator Co

falling of the car were provided whether they were contracted for or not, as an evidence of the maker's intention to give the customer the best equipment available. The same policy regarding the maintenance of a high standard has been followed by the Otis Elevator Company during the sixty years of its existence, and while they do not wait until the last contract is completed before accepting another, the organization does give the closest possible attention to every minute detail of each installation. When it is understood that their Pacific Coast department alone averages more than one elevator for every day in the year, it can

readily be seen that no small amount of detail is involved.

The introduction and development of electric elevators led to the improvement of other types. The increased speeds obtained, together with improvement of the safety features, resulted in New York City in what is undoubtedly the most remarkable change which has ever come about in any city in a like number of years. A glance at a photograph of the lower part of Manhattan Island taken in 1876 shows the present postoffice building looming up in such proportions as to dwarf everything else in sight, excepting the Tribune Building, and Trinity and St. Paul church spires. A photograph taken a few weeks ago from the same point fails to disclose the post office at all, the same being completely hidden by the large surrounding buildings, while Trinity and St. Paul's are both so completely overtopped by the nearby gigantic office buildings as also to be lost to view. From four and five story buildings which were then the rule, sky-scrapers have developed with the aid of the elevator, the eighteen and twenty story buildings becoming as common as the old four story building, while the advent of the Otis Traction Elevator has made possible the forty and fifty story sky-scrapers recently completed.

The Otis Elevator Company's Pacific Coast Department headquarters are located at Stockton, North Point and Beach Streets, San Francisco, and from this point is directed the Company's business in California, Oregon, Washington, Idaho, Nevada, Arizona, Montana, Utah, Colorado, Wyoming, Alaska and Territory of Hawaii. Branch offices are maintained in Portland, Oregon; Seattle, Spokane and Tacoma, Washington; Los Angeles, Oakland, San Diego, Sacramento and Fresno, California; Salt Lake City, Utah; Boise, Idaho; Denver and Colorado Springs, Colorado, and Honolulu, T. H.

The main building of the Company's plant in San Francisco is 275 feet long by 65 feet wide and two stories high. The main floor is devoted to the metal working and electrical departments, while the second floor contains the offices and stock room. Adjoining buildings contain the wood working department, blacksmith shops and storage for castings, steel beams, lumber, etc. The plant in San Francisco, including stock, represents an investment of more than $800,000.00, with a $200,000.00 annual payroll. Most of the principal buildings in all the western cities contain Otis Elevators.

The tallest business structures in the world are equipped with Otis Elevators; among these may be noted:

Woolworth Building, New York.
Singer Building, New York.
Metropolitan Building, New York.
Whitehall Building, New York.
Hudson Terminal Building, New York.
No. 1 Wall Street, New York.
Bankers Trust Co. Building, New York.
Postal Telegraph Cable Co., New York.
Park Row Building, New York.
Fire Company's Building Corporation, N. Y.
N. Y. Telephone Company Building, New York.
Peoples Gas, Light & Coke Company, Chicago.
Republic Building, Chicago.
Blackstone Hotel, Chicago.
Hotel Sherman, Chicago.
Insurance Exchange Building, Chicago.
North American Building, Chicago.
Chicago Telephone Company, Chicago.
Marine National Bank, Buffalo.
Hamilton National Bank, Chattanooga.
Cleveland Telephone Company, Cleveland.
Statler Hotel, Cleveland.
Hollenden Hotel, Cleveland.
Adolphus Hotel, Dallas.
Daniels & Fisher, Denver.
Hotel Pontchartrain, Detroit.

WOOLWORTH BUILDING, NEW YORK CITY

This building, the tallest in the world, is equipped with 26 Otis Gearless Traction Elevators.

Two of the elevators run from the first to the fifty first floor with actual travels of 679 feet 9½ inches and 679 feet 10½ inches respectively. There is also a shuttle elevator which runs from the fifty first to the fifty fourth floor.

Total height of building from curb to base of flag staff, 785 feet.

Dime Savings Bank, Detroit.
New Rice Hotel, Houston.
Alworth Building, Duluth.
Scarritt Estate, Kansas City.
Flour & Corn Exchange, Minneapolis.
Cotton Exchange, Memphis.
First National Bank, Milwaukee.
Prudential Life Insurance Co., Newark.
First National Bank, Pittsburg.

Oliver Building, Pittsburg.
Curtis Publishing Company, Philadelphia.
Eastern Township Bank, Quebec.
First National Bank, Richmond.
Syndicate Trust Company, St. Louis.
Third National Bank, St. Louis.

Dominick Burns Building, Vancouver, B. C.

and to come nearer home:

42 story L. C. Smith Building, Seattle, Wash.
Whittell Building, San Francisco.
Humboldt Bank, San Francisco.
Whitney Building, San Francisco.
Alaska Commercial Building, San Francisco.
Metropolis Bank Building, San Francisco.
Royal Insurance Building, San Francisco.
Hearst Building, San Francisco.
Standard Oil Company Building, San Francisco.
Hobart Building, San Francisco.
Old National Bank Building, Spokane.
Corbett Building, Portland.
Yeon Building, Portland.
Northwestern Bank Building, Portland.
Los Angeles Trust & Sav. Bank, Los Angeles.
Los Angeles Investment Company, Los Angeles.
I. N. Van Nuys Building, Los Angeles.
New Rosslyn Hotel, Los Angeles.

All of these buildings are equipped with Otis 1:1 Gearless Traction Electric Elevators, and in making this list only a few representative buildings were selected, in different sections of the country. There are numerous other buildings containing this same type of equipment, and hundreds of other buildings in the sky-scraper class equipped with Otis Elevators of other types. The Otis 1:1 Gearless Traction Elevator has been selected by the world's most celebrated engineers for the world's greatest structures, due to the remarkable features of this apparatus that place it in a class by itself as regards safety, efficiency, durability, and smoothness of operation. Due to the slow moving parts of the elevator engine itself, and the massive construction of the apparatus, electrical troubles with this type of elevator are practically unknown. A corps of experienced engineers and elevator experts are in the employ of the Company, and are pleased at any time to render assistance to architects in connection with their specifications and plans.

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THE QUANTITY SYSTEM OF ESTIMATING.

(Concluded from page 135)

performed is clearly indicated by the Bill of Quantities which is the essence of the contract. Third, no expense to the bidder, the owner pays for his own quantities "knowingly," and they benefit him as well as the contractor. The owner pays now, but this fact is not emphasized or brought to his attention, and so he does not know it. The percentage added to a bidder's net cost is not all profit, a certain portion of such percentage is absorbed in costs of running his business and similar overhead charges, which ultimately are, of course, paid by the owner. Fourth, saving of disputes arising from extra claims which often occur through vagueness of drawings and omissions, or other error in specifications. Fifth, better opportunities for the careful, competent bidder. With the Quantity System the bidders all work up from the same basis. The incompetents cannot omit or forget the painting, glass or other items, and so take work away from more careful or competent bidders. Sixth, better work and more harmony will result, for the reason that if no part of the work has been omitted there will be less temptation to "let up" on the work, and which usually results in dissatisfaction, if not friction or worse. Seventh, misunderstandings reduced to a minimum. The Bill of Quantities is the "interpreter" of what is intended, a sort of clearing house for the drawings and specifications. Eighth, neither party to the contract can obtain any advantage over the other on quantity or description of work. Ninth, no disputes with subbidders, it being clearly stated what each trade is to furnish. Tenth, contractors having much less figuring to do, can then devote more time and give more attention to buildings in hand, and especially in supervising and directing their sub-contractors, which is much wanted now. Eleventh, owners and architects would be less liable to have inferior contractors as the lowest bidders. Twelfth, fewer extras. These are usually a trouble to all concerned. Should any occur, they can be easier adjusted if the schedule prices govern in such case. Thirteenth, the architect or engineer, if he so desires, can have the advantage of collaboration with the professional Quantity Surveyor, who also would be available when preliminary figures are required, which information is now so often furnished by the contractors, thereby creating an undesirable obligation. Fourteenth, no change or reorganizing of architects' or engineers' offices necessary, whilst much detail work now involved when taking figures will be taken care of by the Quantity Surveyor's office. Fifteenth, when the contracts are signed, the drawings and specifications will previously have been made as complete as it would be possible to make them, thereby avoiding subsequent inconvenience to the contractor and his foreman on the job, and doing away largely with inquiries at the architect's offices by contractors during progress of the work.

The particular system suggested for our use should be one best adapted to American needs and sentiment, a practical system, which would meet our special requirements and endorsement. Such a system has been under consideration for some years past, one that is expected to meet with general approval and adoption, at least until experience or wiser heads suggest something better. For many reasons it would be undesirable to accept the English system in either of its forms. That is to say as a "system" for general use. The great principle it stands for, however, viz.: that of giving as well as receiving a square deal, can be both accepted and used with much advantage to both owner and contractor. It suggests no haphazard or guesswork methods, which is true business and fair to all.

Now, very briefly: How can this system be adopted? It takes time, of course, to get rid of old customs or old habits, however bad they may be. But considerable progress has already been made, and the outlook all over the country favoring better methods is now certainly encouraging. At the inception of this movement, however, in 1891, it was not easy to find any one willing even to admit that betterment in estimating conditions were necessary, or even possible, and there were fewer people still who knew anything about the Quantity System. Happily, we are a progressive people, and things are not done today as they were twenty or thirty years ago. Indeed, it is now very generally recognized that estimating and certain contract conditions are about as bad as they can be. Quite recently it was stated by an experienced contractor whose opinions both deserve and command respect, that if a bidder figured to do everything just exactly

as it was called for, he would not get one job in fifty, and the reasons why are well known to those in the business.

After once the principle and the safety of the Quantity System is understood (and the words "Safety first" should become a national slogan), after its many advantages are recognized, its equity between owner and contractor becomes immediately manifest.

To adopt the system generally the organization referred to hereafter advocates that the United States Government and every state and county in the Union should furnish, free of cost, to every bidder detailed Bills of Quantities, setting forth clearly and squarely exactly what quantity and nature of work it is that a bidder will, if successful, be required to perform in order to properly complete the contract. The next step, it is thought, will be that municipalities will follow the same practice. The advantages obtained will quickly become known in every locality among private owners and the building community, and the present practice, which is already tottering, will be a thing of the past, and we shall all be wondering why such a labor-saving, sensible method has hitherto been neglected in the present day, and in our generation.

Accuracy and honesty are the Quantity Surveyor's chief essentials, apart from his professional ability. It seems, therefore, that the practice of Quantity Surveying should be legalized in each state, somewhat similar to that of the public accountant, through examination and subsequent issue of licenses to persons thus qualified and wishing to practice. The furnishing of surety company's bonds by the Quantity Surveyor has been suggested in some quarters, to guarantee his accuracy and honesty, but it would seem that until a similar guarantee is demanded from other technical practitioners, the expediency and efficiency of this course may fairly be questioned.

It may be stated, perhaps, that to still further advocate the adoption of better estimating methods and more satisfactory contract conditions, an organization was formed last year known as the American Institute of Quantity Surveyors, which is doing much good work along these lines. Its membership is open to all architects, engineers, contractors and others (including owners) who are in sympathy with the efforts being made to bring about better conditions. The dues are merely nominal, including the official bulletin every month, which gives the progress of this movement throughout the United States, whilst its columns are open to all for suggestions or inquiries regarding the work of the organization in general or the Quantity System in particular.

It may perhaps be only fair to add (with due modesty, however, let us hope) that to San Francisco belongs the credit of being the first city in the United States in which a systematic effort was ever made to bring about better estimating conditions such as the Quantity System affords. This movement commenced many years ago, in 1891, when in the month of April an informal address and discussion took place before members of the Builders' Association of California (now the General Contractors' Association).

Immediately following this came an address entitled "The Quantity System of Estimating," in the Academy of Sciences Building, before the San Francisco Chapter of the American Institute of Architects. Much interest having been aroused, no opportunity was afterwards lost of sustaining it. Articles were contributed to architectural and building journals in the East and elsewhere. "Better Estimating Methods" was the slogan consistently urged for years. In 1905 a paper on this subject was given and discussed before the Technical Society of the Pacific Coast. The conflagration in 1906 somewhat disturbed the progress of the work temporarily, but it was soon resumed and brought once again to the front. It has since grown until now the movement has spread from the Pacific to the Atlantic, and from Boston to New Orleans. Everywhere today the subject is being received by engineers and contractors, as well as by architects, with the greatest interest. I can testify as to this, having but recently completed a tour of some 14,500 miles undertaken solely for the purpose of meeting the leading architects, contractors and engineers of our large cities and of personally still further advocating higher contract ideals and better methods, such as always follow the adoption of the Quantity System of Estimating.

Editorial Note.

The Quantity System of Estimating has been systematically advocated since 1891. From time to time it has attracted much attention among contractors, architects and engineers as a direct result of Mr. Wright's long continued and well known activity with the subject. In course of time this system of estimating must be adopted, as it always stands for a square deal between owner and contractor, which is much to be desired. The movement in aid of this work is purely a voluntary one, an honest effort to bring about a betterment of existing estimating and contract conditions and which when consummated will be a boon to all concerned, including the owner.

Those of our readers who are in sympathy with this work, or who desire information concerning the system, or who may be willing to participate in the good work, are cordially invited to communicate with Mr. Wright personally at 571 California Street, San Francisco, California.

Trade Notes

The Hoffman Heater Co. maintain their own office in San Francisco at 397 Sutter St.

Architect Elmore R. Jeffery has returned from a trip to San Francisco, where he spent several days on business and pleasure.

William B. Noe, Jr., architectural designer, formerly of the firm of Noe & Spencer, has opened office at 127 Coulter building, Los Angeles.

Architect Normand W. Mohr has moved his office from the Bankers Investment building to Room 829 Examiner building, San Francisco.

Mr. Watson E. Reid, Portland representative of Reid Bros., architects, 603 Yeon building, Portland, Ore., has recently made a trip to Los Angeles on business for the firm.

State certificates were granted this week by the Board of Architecture to Charles M. Hutchison, 1405 Hibernian building, Los Angeles, and to John B. Hawley, Register building, Santa Ana.

The Panama-Pacific Exposition has approved the adoption of the Hoffman Heater in all buildings for the Exposition Company. This recognizes them as the official heater of the Exposition.

Architect Julian L. Everett has moved from the Walker building to Room 400 Boston block, and occupies offices jointly with W. R. B. Willcox, who was formerly of the firm of Willcox & Sayward.

Architect Frederick H. Eley of Santa Ana and John B. Hawley, who has been connected with the office for nearly two years, have formed a partnership. Mr. Hawley was recently granted a certificate to practice architecture.

Henry Bacon, one of the leading architects of New York, is now on his way to San Francisco to superintend the finishing of the great Court of the Four Seasons, which will be the first of the five courts to be completed.

Charles H. Bebb, F. A. I. A., and Carl F. Gould, A. A. I. A., have formed an association for the general practice of architecture, with offices in the Denny building, Seattle, where Mr. Bebb has been located for a number of years.

Architect C. O. Clausen, formerly located in the Phelan building, has found it necessary owing to his increased business to secure larger quarters, and has taken three large rooms, 722, 723 and 724 Hearst building. These offices are now open to his clients.

Octavius Morgan, senior member of Morgan, Walls & Morgan, architects, has returned from Europe and is now visiting eastern cities. Mr. Morgan attended a meeting of the board of directors of the A. I. A., of which he is a member, at Washington, D. C., on May 15.

Mr. B. F. Turnbull, architect, Everett, Wash., is supervising the erection of the $35,000 high school at Marysville, Wash., for which he prepared the plans. Mr. Turnbull is also supervising the erection of a brick building at Monroe, Wash., for A. B. Spraw, for which he also drew plans.

Architect Francis W. Grant, Globe block, Seattle, Wash., has just been commissioned by the county commissioners of Clallam County to prepare the plans for the construction of a $50,000 court house at Port Angeles, Wash. The building will be two stories and of brick and terra cotta construction.

W. R. B. Willcox, F. A. I. A., and of the firm of Willcox & Sayward, 400 Boston block, Seattle, left May 9th, 1914, to attend a meeting of the board of directors in Washington, D. C., of which he is a member. During his absence he will visit Burlington, Vermont, where he has some work under way.

W. B. Thuman, president of the Thuman Door Co. and vice-president of the Simplex Window Co., has been in San Francisco on business. Mr. Thuman reports a large business on Simplex Windows throughout the San Joaquin Valley, including all the new school houses that are to be erected in Fresno at a cost of $500,000.

Howard Frost, president of the Los Angeles Pressed Brick Co., of Los Angeles, has been in San Francisco with his superintendent, Mr. Gustave Larsen. Mr. Frost reports they are closing a number of good contracts in Southern California as well as through the United Materials Co. of San Francisco, their northern representative.

The Giant Suction Cleaner Co., Bacon building, Oakland, have a new illustrated catalogue which shows fully the vacuum cleaner installed as a compressor and vacuum cleaner combined. The piping illustration is of such character that it embodies every known fitting that can be successfully used and properly installed in a perfect working system.

The Frederick Post Co. is preparing a new issue of their catalogue which will be ready for distribution the early part of 1915. To meet immediate needs a reprint of their old catalogue is now being offered and will be sent to any architect or draftsman on request. One of the new features of the Frederick Post Co. is their new brand of tracing cloth, bearing their name, which, on account of its many excellent qualities, has already found great favor among the profession during the short time it has been on the market.

Gladding, McBean & Co. report the following contracts for terra cotta on the following buildings in Southern California: The Haas building, Morgan, Walls & Morgan, architects; the new Citizens Nat. Bank building, Parkinson & Bergstrom, architects; the Broadway Lease Hold Co. building, Mayberry & Parker, architects; all in Los Angeles. The United States postoffices in Pasadena and Santa Barbara. The recent contracts in the northern part of the state include the U. S. postoffice in Berkeley, office building for the Firemen's Fund Insurance Co., L. P. Hobart, architect, and the Cowell building, H. H. Meyers, architect, in San Francisco.

In the following circular letter addressed to their agents, the firm of W. P. Fuller Co. announce another new industry for the Pacific Coast.

"Our salesman has doubtless acquainted you with the fact that we now manufacture our own prepared wax, but possibly he has not thoroughly **convinced you of the excellent quality of this product.** We wish to assure you that we refrained from marketing Fuller Floor Wax until our laboratory tests convinced us that we had a very superior product—superior in wearing quality as well as in ease of application. It is free from objectionable odors, does not gum up when subject to pressure and does not soften when exposed to warm temperatures. The fact that this wax is supplied in net weight containers, coupled with the low price at which you can buy it, cannot fail to interest you."

Mr. J. S. Stevenson, general manager of Berry Bros., Detroit, Michigan, states that the month of April, 1914, was a record-breaker, as they received the greatest number of orders in April that they ever received in one month during the history of the firm. This is remarkable when you consider the general business depression over the United States for something like the last twelve months.

Berry Bros. are the most extensive advertisers of high-grade varnish in this country, thereby further argument to the point "Does it pay to advertise?" goods of superior merit.

Eleven of their salesmen won prizes during April. Since erecting a new building, completed in January, 1914, for the exclusive use in the manufacture of "Berryeraft" and "Luxeberry White Enamel," has already been outgrown, so that another addition is now in the process of erection after the completion of only five months ago.

CALIFORNIA

San Francisco—Architect Frederick H. Meyer, Bankers' Investment Bldg., has completed plans for the erection of a three-story and basement apartment house for Mrs. Bertha Overfeld, to be erected at the corner of Green & Fillmore Sts., at a cost of $30,000.

Architect Geo. W. Kelham, Sharon Bldg., has completed plans for the three story and basement Class A construction library for the City and County of San Francisco, to be erected in San Francisco's Civic Center at a cost of $1,000,000.

Architect Sylvain Schnaittacher, First National Bank Bldg., has completed plans for the construction of a two story Class A garage for G. P. W. Jensen at a cost of $40,000.

Architects Smith & Stewart, 244 Kearny St., have completed plans for a seven story and basement brick and steel hotel building to be on the corner of O'Farrell and Taylor Sts., and to cost $70,000.

Plans are nearly completed for the two story and basement Class C construction church for the Christian Science Church, by Architect Wm. H. Crim, Jr., at a cost of $50,000.

Architect A. F. Heide, 46 Kearny St., is completing plans for the construction of a two story frame and plaster State Exhibit Building for the State of Washington, at a cost of $60,000.

Plans have been completed by Architect Houghton Sawyer, Shreve Bldg., for the construction of a two story and basement reinforced concrete school building at a cost of $110,000.

Alturus, Cal.—Plans are now being revised for the construction of a court house dome and basement of reinforced concrete for Modoc County, by Architect F. J. DeLongchamps, Reno, Nev., at a cost of $90,000.

Sacramento, Cal.—Architects Shea & Lofquist, Bankers' Inv. Bldg., San Francisco, have completed plans for a two story and basement school building for the city of Sacramento at a cost of $200,000.

Chico, Cal.—Architect A. J. Bryan, Chico, has prepared plans for a two story and basement brick school building for the Oakdale School District at a cost of $50,000.

Riverside—Architect J. W. Carroll has prepared plans and will build a new theater building for George Frost at a cost of $75,000.

San Bernardino—Architect Norman F. Marsh, 214 Broadway Central Bldg., Los Angeles, is preparing preliminary plans for the new polytechnic high school at San Bernardino. There will be a group of six buildings and it will cost about $210,000.

The same architect is preparing plans for three buildings for the Alhambra high school at a cost of $100,000.

San Diego, Cal.—Architect D. H. Holmes is drawing plans for a large business building for the block bounded by 15th, 16th, Broadway and C Sts., for B. F. Murtha. It will cost approximately $75,000.

Los Angeles, Cal.—Architects Frederick Noonan and Wm. Richards, 609 Brockman Bldg., have been commissioned to prepare plans for a reinforced concrete department store building to be erected on the old postoffice site at 7th and Grand Ave., for J. W. Robinson Co., at a cost of $750,000.

Architects Dennis & Hewitt, 618 Fay Bldg., have prepared plans for a two-story brick flat building to be erected at 1628 Hudson St., Hollywood, for O. P. Dennis.

Architects Parkinson & Bergstrom, Security Bldg., are now taking bids for the erection of a seven-story reinforced concrete bank building at Pasadena for the Citizens' Natl. Bank of that city.

The Los Angeles City has voted to issue $4,600,000 bonds for the purchase of school sites and construction of school buildings. The new buildings will be brick or concrete construction.

Architect W. J. Dodd, 321 Marsh-Strong Bldg., is completing working plans for the new school building to be erected at Beverly Hills. It will be a one-story structure, and will contain six class rooms, at a cost of $20,000.

The Milwaukee Building Co., Wright & Callender Bldg., has completed plans for a four-story Class C brick hotel building to be erected at Ninth and Wall Sts., for E. W. Pascal, Mason Bldg., at a cost of $60,000.

WASHINGTON

Seattle—Architect John Graham, Lyon Bldg., has completed plans for a two-story and basement brick apartment house for D. R. McKay at a cost of $100,000.

Architect David Dow, 21st and Spruce Sts., Seattle, has completed plans for a five-story and basement brick and steel apartment house, for H. M. Richmond, at a cost of $60,000.

Architect A. Warren Gould, Seattle, has revised plans for a Court House group of three and five story buildings, Class A construction, for the City of Seattle, at a cost of $950,000.

Architect Carl F. Gould, Boston Block, Seattle, is completing plans for the construction of a two story and basement hollow tile construction residence for J. H. Blodell at a cost of $50,000.

The same architect is preparing plans for a two-story, attic and basement residence for C. N. Larabee, at a cost of $50,000, to be erected at South Bellingham, Wash.

Plans for the construction of a five-story reinforced concrete cold and warm storage plant at the foot of Bell St. were prepared by Capt. A. O. Powell, Central Bldg., at a cost of $400,000.

Architect B. Marcus Priteca, Empire Bldg., has completed plans for the construction of a six-story steel and concrete office and theater building for Alexander Pantages, at a cost of $16,000.

Sedro-Woolley—Architects Saunders & Lawton, Alaska Bldg., have completed plans for the construction of a concrete tunnel and covered walk at Sedro-Woolley to cost $35,000.

Tacoma, Wash.—Plans are being prepared for the construction of a Moose Lodge building of concrete and brick construction at a cost of $50,000.

Architects Lundberg & McMahon, Provident Bldg., are preparing plans for a $100,000 theater building, to be of concrete and tile construction.

Hoquiam, Wash.—Architects Stephen & Stephen, Seattle, Wash., are completing plans for the construction of the Hoquiam High School at a cost of $100,000. It will be completed in time for use during the next school year.

OREGON

Portland—MacNaughton & Rayment, Architects, Title & Trust Bldg., have been commissioned to prepare plans and specifications for the proposed $90,000 building to be erected on the East Side for Oscar Heintz, of the Pacific Iron Works, which has been leased to the Blake-McFall Paper Co. The estimated cost is placed at $90,000.

Architects Claussen & Claussen, Macleay Bldg., have completed plans for the construction of a four-story and basement brick and steel apartment house for Mrs. C. Brown at a cost of $100,000.

Architect Aaron H. Gould, Henry Bldg., Portland, Ore., have completed plans for the construction of a two-story and basement Class A theater, to be erected at the corner of Park and Stark Sts. at a cost of $100,000.

Astoria, Ore.—Architects Whitehouse & Fouilhoux, Wilcox Bldg., Portland, have completed plans for the construction of school alterations and additions at a cost of $20,000.

McMinnville, Ore.—Architects Jacoberger & Smith, Board of Trade Bldg., Portland, have completed plans for the construction of a hollow tile church for the Roman Catholic Church of McMinnville at a cost of $25,000.

Architect Ernest Kroner, Worcester Bldg., Portland, was selected to prepare plans for the proposed school building to be erected this summer for the city of McMinnville at a cost of $30,000.

Klamath Falls, Ore.—Architects Veghte & Co. have prepared plans for the construction of a municipal building for the city of Klamath Falls.

The Dalles, Ore.—Architect C. J. Grandall has completed plans for the construction of a three-story and basement brick school for the city of Dalles at a cost of $100,000.

Silverton, Ore.—Architects Tourtellotte & Hummel, Rothchild Bldg., Portland, are preparing plans for a four-story and basement brick lodge hall for the Masonic Hall Assn. of Silverton at a cost of $20,000.

MISCELLANEOUS

Vancouver, B. C.—Plans have been prepared by Architect R. Mackay Fripp, Hutchison Bldg., for a two story frame residence. It will cost $6,000 and the work will be let under one general contract.

Plans are being prepared for the proposed new Strathcona School Bldg., to be composed of 24 rooms, three stories, and to cost $100,000. It is to be of reinforced concrete.

Prince Rupert, B. C.—Plans for the Prince Rupert Postoffice have been approved at Ottawa, and this will be of reinforced concrete, five stories, and to cost $250,000.

Architects Mitton & Gillingham, 413 Granville St., have prepared plans for an eight story reinforced concrete hotel to cost $150,000.

Architect Jesse M. Warren, Victoria, is completing plans for the remodeling of the Harris Block, at 10th and McPherson Sts., to cost $20,000.

Architects Honeyman & Curtis, 821 Pender W., are completing plans for a seven story reinforced concrete and brick hotel building to be erected on Main St., adjoining and possibly taking in the present Blackburn Hotel site, to cost $100,000.

Fort George, B. C.—Plans have been prepared by Architect Herbert Peyton for a four story fireproof hotel at Fort George, to cost $125,000.

Kingman, Ariz.—Architects Lescher & Kibbey, 400 Bank of Arizona Bldg., Phoenix, have prepared plans for a courthouse to be erected at this place at a cost of $75,000.

Tucson, Ariz.—The Board of Regents of the University of Arizona at Tucson have eliminated all except two of the plans submitted in competition for the $150,000 agricultural building to be erected at Tucson. The choice now lies between plans submitted by William Richards of the firm of Noonan & Richards, Brockman Bldg., Los Angeles, and Bristow & Lyman of San Diego. The board expects to reach a final decision at its next meeting which will be held on Monday.

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VOLUME EIGHT
NUMBER ONE

JULY, 1914

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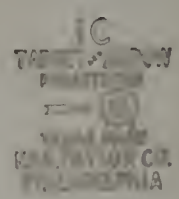

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The Pacific Coast Architect

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THE PACIFIC COAST ARCHITECT

J. A. DRUMMOND - - - - - - - Editor and Publisher

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EDITORIAL.

The Ideal Architect

We often hear complaints on criticising the different architects from time to time, but you must remember they are only human, thereby not all perfect and some have many shortcomings.

Let us grant them some consideration, as their tasks are many and there are always two sides to every question.

The architect should be artist and business man combined. He is not the function of merely interpreting a dream, as does a sculptor or painter, giving tangible expression to his thoughts and selling the product to whomsoever has the price, he does not build fantasies, buildings and then place them on the market. His function is more specific, more real, more commercial, if you will.

The purpose of building is decided upon before he is called in, it is very definite, it rarely is purely ornamental and generally is erected to produce revenue, or to house some special commercial plant, or as a home or house of worship, whose occupants have especial needs or notions and limitations that should be catered to and served. His is the task of putting those ideas into reality, of producing that revenue, of making convenient and easy of operation that factory or school.

Advantage must be taken of that site already selected or owned, consideration must be given to surroundings; a perfect structure, with all its complexity of details and specialties must be produced, and the whole must be kept within a limit of cost that has been prophesied, anticipated by the architect. On top of all that, if he is a true architect, he will make that building beautiful, whatever its purpose, whatever its cost, however humble it may be. And such a task elevates that work into the most ideal, the noblest, the grandest, the finest of fine arts and without exception the greatest and most complex of all the sciences, for it must take into account and actually comprehend at least the rudiments of some of the details of them all.

Quality, Accuracy and Efficiency in Construction

Great stress is brought to bear on the manufacture of building materials to produce goods of standard and uniform quality. This feature is diligently practiced by a large number, but there is, and no doubt always will be the manufacturer whose method of securing business is to produce the article which is "cheap" to catch the attention of the "first cost" buyer.

There is a new slogan among the railroads of the present day, "Safety First," to the manufacturer this should be "Quality First."

The same can be said of the architect using the word proficiency for a better definition, this requires years of study and practice to obtain. When we find this feature in conjunction with natural ability there is ample room near the top of the ladder for this party to enter the architectural profession.

The architect fills the duty of accuracy in the drawing of his plans and specifications. There can be volumes written on this subject and yet there is room for more to be said.

While the architect finds fault and criticises the manufacturer, it behooves many to "begin charity at home." There is originality of design to conform with local conditions, not forgetting all the value of the Classics, Renaissance, Gothic and the Fine Arts of the modern ages. We can cite numerous instances where accuracy of estimating construction costs have not only seriously implicated owners, but ruined many, and it is to be hoped that better methods of taking quantities will soon be more universally practiced.

The science and study of efficiency is a matter of recent years, but like the tango and the maxixe, it has become a wave and is being advocated and studied on all sides.

Let the architect, contractor, manufacturer and material man take heed lest he fall behind. In the present day of wonderful inventions and marked progress of this country, and the intellectual and educated countries of the world, we must read, study and investigate. Efficiency has a double, quadruple and unlimited value, it is not a thing to be called scientific management and used as a bugaboo, but on the contrary, nothing but common sense applied to everyday affairs.

The doing of a thing in a better, quicker and more economical way, the easy, right and natural way, rather than the careless, slovenly, weary or round-about way; a thing worth doing at all is worth doing right.

Efficiency is a duty not alone of every man to himself, but every man owes this to his neighbor, customer or client. The one word or definition is finally "results."

Build With Brick

The brick manufacturers of this country are beginning to extensively push their products and should use as a slogan "Build with Brick." This duty to their industry is apparent. You notice signs "Do it Electrical," also others "Cook with Gas," and various others too numerous to mention.

Manufacturers should not try to fight concerns of their own industry, as so many do at the present day, if a spirit is manifested to "get together" for their common good. Certain firms establish National Trade Marks which become household words. "Build with Brick" should be posted on every brick yard, sign boards, used in trade papers, advertising on stationery; in other words, everywhere—in unity there is strength. Stop fighting your competitors and work together. There will then be plenty of business for both.

The lumber manufacturers run campaigns of advertising their "Douglas Fir," "Red Gum," "Cypress, the Wood Eternal," "Arkansas Soft Pine," and many others.

Why not start a campaign for bigger and better business along inexpensive but practical lines: Plaster the country with signs, using "Build with Brick" as your slogan. Make the people from the Atlantic to the Pacific and the Great Lakes to the Gulf sit up and take notice, simply by placing before their eyes placards, signs, window cards, street car displays, posters, etc., not necessarily advocating any special brick, just impressing upon the mind the fact that brick is the thing. Let the telephone and the telegraph poles be decorated with cards bearing the slogan "Build with Brick." On vacant lots place small sign boards. Run small card advertisements in the street cars. Place "Build with Brick" stickers around where you know they will attract attention. Use your moving picture houses to advertise your wares. Place signs on the buildings you are furnishing. Put the slogan on your wagons, freight cars and buildings. Any one of these will help the cause and you can spend just the sum you feel you can afford. Do it now, so that the country will be plastered over with signs that will *boost* the entire brick business everywhere.

There are over 10,000 brickmakers in the country. Suppose each put up 1,000 signs on which appear the magic words "Build with Brick." That will make 10,000,000 signs staring millions of people in the face. It will bring splendid results and will cost but a few paltry dollars. Are you game to do your share of the boosting?

Views of Governor Glynn of New York on Brick

"Instead of roads that wear out in ten years, New York must build roads that will last twenty to thirty years. Instead of building highways that cost $1,000 per year to maintain, New York must construct roads that can be maintained at a moderate annual cost.

"Brick roads have been laid in hundreds of cities, and have everywhere demonstrated their durability. Brick roads have been down for twenty-five years and have admirably stood the test of the hardest kind of traffic. The annual cost of maintaining these brick roads has been remarkably low, ranging from practically nothing to from $10 to $50 per mile.

"Even if New York were compelled to pay $25,000 per mile for brick roads, it would be economy to build such roads instead of macadam roads in all places where the State's highways are subjected to heavy automobile traffic."—(Excerpt from the Governor's message to the New York State Legislature.)

Equivalents in Specification Writing

Equivocal specifications are frequently the result o an honest endeavor to write definite specifications whil working in the shadow of a doubt, and then again wha appears to the better informed as an ambiguity protecte by the words "or equal" is a wholly proper safeguard ing of the client's interest against monopolistic tenden cies of the makers of some satisfactory article. The fol lowing paragraph is suggested as a safe way of usin the much-discussed words "or equal":

"Equivalents—The term 'or equal' applied to an article or method herein specified implies no right of th contractor to substitute articles or methods other tha those particularly specified, except upon express author ity of the architect in writing, and it is understood an agreed that the architect shall be free to exercise his ow discretion in the matter of all such substitutions and tha the contractor shall have no recourse if permission t substitute be denied."

Under guise of granting "equal rights to all an special privilege to none" legislative bodies generally se fit to limit the powers of architects for public works s that no preference for specific articles of material may b expressed in their specifications. Acting under such re strictions, the architect cannot use the above suggeste clause, for it does not make mandatory the substitutio of articles, even though proven to be equal to that speci fied.

In private work, however, it is not only permissible but entirely proper that the architect give to the owne the benefit of his expert opinion as to the relative merit of building materials by expressly selecting brands an makes, but he should retain complete control of the mat ter of substitutions, using the term "or equal" only t protect the contractor and owner against unscrupulou dealers and manufacturers, of whom there are many, wh will take advantage if the specifications seem to exclud competition.

Contractors also have decided preferences and wil claim the possession of as good judgment upon whic to base their preferences as have the architects, and al though this is often true it is frequently true also tha their preferences are based upon considerations othe than those of merit. It is the buyer, however, and no the seller who should have the choice, whether in building a house or buying clothing.

Many contractors have so insatiate a desire to sub stitute something "just as good or better" throughou the construction of a building as to become a nuisance t the architect, who, though having once made his selec tion to his own satisfaction and that of his client, is called on to do it all over again to the satisfaction of the con tractor. Such practices on the part of the contractor may when chronic, be looked upon with suspicion and should be discouraged.

In the use of the clause here suggested it should be remembered by the architect that an invariable and exact observance of the requirement that authority for a sub stitution be issued by the architect in writing is necessary to the integrity of that portion of the contract. To waive this formality in one instance will be looked upon by the courts as a waiver of its necessity thereafter, thereby nul lifying the provision altogether. This, of course, applies with equal pertinancy to all similar contract provisions.

Better Construction

Can the statement, "It pays to build better," be borne out by actual facts and figures to the extent that the man of average means can afford to safeguard his prop

erty and the lives of his occupants by the use of a larger percentage of fireproof material?

From a rather exhaustive inquiry and investigation which we have recently made, we believe that this question can be safely answered in the affirmative. If this conclusion can be reached in an investigation of the expense in building dwellings suitable to the needs and resources of the man of average means, there would seem to be no excuse for continuing the flimsy fire-trap construction.

It has been estimated that more than 50 per cent of the hazard in residence property comes from exposure or adjoining fire, and that the ordinary shingle roof is responsible for fully 75 per cent of this particular hazard. The shingle roof not only furnishes inviting material for the falling spark, but it also furnishes flying "fire brands" in case of fire. Our investigation proved conclusively that the difference in cost of an absolutely fireproof roof over the ordinary shingle roof upon the average dwelling, in so far as it applies to exposure, ranges from $100 to $150, depending upon the size of the building. With this difference in the cost of construction there is no other modern improvement which could be added to a dwelling which would give as large returns for the amount invested. The fireproof roof will outlast three of the ordinary shingle roofs without any expense for repair. If in addition to this, fireproof material is used in the construction of the wall, the property owner has not only reduced his expense in upkeep, but has also reduced his possible loss in case of fire at least 50 per cent. In this way the fire hazard is reduced to such an extent that the owner can afford to carry a sufficiently reduced amount of insurance to give them good interest on the additional investment.

Architectural Publicity

There is a growing belief in publicity at the present day. Architects should take heed that the proper form of publicity has made certain "Trade Marks" a household word. Progressive manufacturers and dealers are readers of papers and trade journals.

The trained and skilled architect of the present day is fast realizing that he has to go out and "get" business like manufacturers send out salesmen, also advertising their wares in various manners. The leading actress and actor of the present day inevitably proceed to create something sensational to get before the public to develop large box office receipts.

The skilled architect should advertise himself and his profession. Some we know never leave their offices to look for a contract and they are soon left behind by their more progressive colleagues in the profession.

It is often conceded that the majority of leading architects of the present day are termed as good salesmen. They sell their wares, including the manufacture and execution of their plans and specifications, leaving minor matters of detail assigned to departments which have their careful supervision. A successful architect must also be a good business man.

Let the architectural associations, chapters, etc., look to their laurels and develop their profession publicly. Your clients are from the intelligent and wealthy classes, but they generally need education along your professional line.

Get together and foster your interests or numerous large contracting firms, employing their own drafting departments and designers, will make further inroads on your chosen profession.

To Harmonize Building Codes

One of the topics which is receiving considerable attention at the various meetings of architectural societies and clubs throughout the country is the standardization of the building codes of various cities. An architect whose business is confined to one community does not in his own experience realize this necessity, but the limitation to professional work to one city is usually the experience only of the earliest years of an architectural career.

Many limitations are made in the provisions of building codes by State legislation and activity in building regulation is very pronounced in many parts of the country. And because of this activity among the various legislatures the confusion of plans and principles that control is becoming greater rather than clearing up, for conditions are drafted and wrought into laws at each capitol without special reference to what may have been done along the same line in other States. All this is increasing the handicap under which the profession of architecture can be practiced, especially in its larger phases, and the situation is one that calls not only for discussion but for action.

There is on the part of the average legislator, or legislative committee, no opposition to a code that might be almost national in its scope. The multiplicity of conflicting State codes is the result of chance, not of intent, and were there to be an active and persistent effort made by strong associations to alleviate these conditions the results to be accomplished would no doubt be remarkable.

Not only the architect but the builder and perhaps to an even greater degree the manufacturer of building material, is interested in this question. It is not so much that the products of the manufacturer are in danger of being excluded as it is that the requirements for manufacture vary and will continue to vary, without remedial action, in the various States, so that both inconvenience and expense are entailed. There are no factors in American business life too large to be enlisted in this work of harmonization, for it is one of the truly large issues in commerce and industry.

The Value of Trade Papers

In this day of wonderful development and advancement, the yearning for knowledge, new ideas and facts, based on actual experience brought out by practical research, is becoming more apparent every day.

Only a few years ago, trade and technical papers were rarely to be found, but this time of competition and the desire to obtain wealth and fame, the trade paper has played a prominent part.

The daily newspapers border on the current news, and with the haste in which copy is prepared, accuracy is often lost sight of entirely, with the views in mind to create a bold headline and sell the papers. They are generally purchased for 1 cent or 5 cents a copy, and glanced over hurriedly, by the majority reading only the headlines.

Considering the trade paper, it is looked upon for facts, views and helps, along the line of the professions. They have developed until nearly every field of operation is now covered by its trade organ. The days of the general store merchant are numbered and the same is said of the manufacturer. This is the day of specialists along whatever line or endeavor that is preceded.

Each layman should familiarize himself with the current publications along his chosen profession; it will be time and money well invested.

New York State Turns Down Composition Roofing

The State of New York passed a law, October, 1913, and enforced February 1st, 1914, as follows:

"No factory shall be conducted in any building hereafter erected more than one story in height unless such building shall conform to the following requirements:

"All buildings more than four stories in height shall be of fireproof construction. The roofs of all buildings shall be covered with incombustible material or shall be of tar and slag or plastic cement supported by or applied to arches of fireproof materials, and the cornices shall be constructed of incombustible material."

According to the above law, slag or gravel roofs would not be approved for covering factory buildings more than one story in height where the roof deck was of board sheathing.

This is a good movement started in New York state, and is an excellent feature to be put in force on the Pacific Coast, where so many buildings are being erected with the owners' views that they will either be outgrown in five or ten years, or to be sold, owing to the rapid development of this country.

Life and property are sacrificed for reason of this inflammable prepared paper and composition material, also tar and gravel to be permitted as roof covering.

There are numerous materials on the market such as clay tile, metal tile, asbestos shingles, roofing tin, various sheet metal and concrete slab construction, etc. Any of these, when properly applied will outlast the inflammable roofs five to twenty times, and ranging from the same price to double the original first cost, besides being fireproof, they are waterproof and many of these add beauty of design to the structure. A building is known by its foundation and its roof. The architects should see to this, when writing specifications, even if our legislators do not fulfill their duty to humanity.

✧ ✧ ✧

The Proceedings of the Forty-Seventh Annual Convention, A. I. A.

President's Address.

Gentlemen and Fellow Members:

Every third year, as you know, it is the custom of the Institute to forsake the familiar scenes of Washington and to meet in some other city of the Union. And this year we have chosen the city of New Orleans, which to many of us is an unknown country and one filled with romantic associations when we think of its early history, of Mannon Lescaut and the Chevalier des Grieux, of the battle which bears its name, and of all that has happened here since that glorious victory. It is the first time in our history that a city of the South has been the scene of our deliberations; and this fact bears witness to our appreciation of the steadily growing interest in our aims and aspirations taken by our Southern brethren.

It is announced in the programme which is before you that the principal topic of discussion in this forty-seventh convention will be the status of Government Fine Arts. It is not my purpose in these few words to anticipate in any way that discussion. Doubtless many solutions of the problem will be suggested to you. We must hope that some one of these will meet your approval and that of the governmental bodies. The present condition of affairs seems not only to us, but to all those who are familiar with the subject, an impossible one, and eventually some change must take place. It is our duty to consider what particular measure will be for the best advantage of the country, and will most tend to place us in this respect among the civilized nations of the earth.

But in addition to this burning question, other matters of the greatest interest and the gravest importance will be presented to you in the course of the next few days. Ever since that day in 1857, when the little group of architects—the last of whom, Professor Babcock, has been taken from us but a few months ago—met in New York and founded the Institute, its growth has been a steady and most encouraging one, up to the present time. We have now a national body, with about forty Chapters, and a membership embracing the great majority of those who have made a name for themselves from one end to the other of the United States. We have an influence, and we believe a well-deserved influence, on all that relates to our profession. And we owe that influence to the fact that we are truly a national body and not simply a federation of separate societies. But we pay the penalty of our greatness. When various questions arise, many of which demand immediate attention and action, we cannot call all our members together; we cannot even consult with them. And the officers of the Institute, the Board of Directors and the Executive Committee have of necessity a great responsibility forced upon them.

I think I speak for all of them when I tell you how seriously that responsibility is felt. I can assure you that we try very earnestly not to act as a council of ten—a small and irresponsible body which does what it pleases, without any careful consideration of the wishes and views of the great body of our membership; and I am led to make this statement because I find that in some of our communities that idea has been expressed. What we desire and strive for is to represent the whole membership of the Institute north, east, south and west, and in order that we may do this intelligently we must first of all be in a position to understand what our members wish; and if there are divergences of opinion in different communities on any of the questions of the day we should, if possible, be advised of them.

The Journal of the Institute, which finished its first year this month, is one of the means by which we can keep informed of these wishes, and I consider those communications which appear in it under the heading of "The Forum" to be of the utmost value. I hope that those members or those Chapters who desire to do so will make an increasing use of this method of communicating their views to each other. But after all it is what is said and done in our annual conventions which serves as the best guide for those to whom the conduct of the Institute must be largely confided. And I trust you will realize the importance of your deliberations here upon the future of our association.

You will have presented to you various amendments to the Constitution and By-Laws, of a very far-reaching importance and which must be very carefully considered. The Competition Code will doubtless be discussed and debated upon, for, like the poor, it is always with us. In these questions and whatever else may come before you I have one very earnest desire, and that is that the wishes of the Convention, which represents the Institute, may be made plain to us.

Our activities in many directions are constantly increasing. You have only to look at your program to see how many committees have reports to make to you, and nearly all of these reports mean that meetings have been held, that members have traveled from various points to take part in these meetings and given up their time to

them. Whenever any question involving architecture arises in any part of the country, the first thing done is to call upon the Institute for its aid and counsel. And to these calls our members have almost uniformly responded with great good will and self-abnegation.

It is perhaps because our efforts in what we have undertaken have been so fruitful of results that I hear from many sides suggestions as to still further activities on our part. Sometimes these suggestions take almost the tone of complaints—"Why does not the Institute do this or that?"

Now, whatever these activities may be, I feel sure that our members will be ready to take part in them. But there is another side to the question, and that is the eternal one of revenue. We are already living well up to and perhaps beyond our income, so that a plea for greater economy is also heard from time to time. I speak of these things because it is well for you to understand plainly one of the issues with which you are confronted—on the one hand more money and greater service to the public and to ourselves, and on the other a distinct inability to enlarge our field of action and perhaps the necessity of restricting it. I am not aware that anyone has as yet suggested an income tax as the solution of the problem.

But whatever may be done by you, my experience of the last two years leaves me most optimistic. I have to thank all of those with whom I have come into contact during the period of my presidency for the earnest and sincere interest that they have shown in the various questions which have arisen and for the very real services they have rendered to the Institute. And I know that this interest and zeal will continue in the future as they have done in the past.

And now, gentlemen, the Convention is open for business.

WALTER COOK, President.

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Idaho State Capitol Building

(By J. E. Tourtellotte.)

The Legislature of the State of Idaho in 1905 passed a bill providing for the purchasing of property and the construction thereon of a capitol. The bill also provided that the Governor, Secretary of State and the State Treasurer, and two other men appointed by the existing members, making a total of five persons, should be the capitol commission, with power to act for the State in the planning and construction of the building.

A competition program was composed and printed, and an open competition was advertised, inviting architects to submit competitive drawings and descriptions agreeable to the program which was furnished each intending competitor.

There were nineteen architectural firms who entered the competition. Architects from coast to coast were in evidence, some of the more prominent being Heins & Lafarge, of New York City; Ferry & Class, of Milwaukee; Myers & Sons, of Detroit, who had designed the capitols for Michigan, Texas and Colorado; Theo. Link, of St. Louis, who designed the capitol of Mississippi; Bell & Deitweiler, of Minneapolis (Mr. Bell, who was previously associated with a Mr. Kent in Montana), designers of the capitol of Montana.

The commission, after three weeks' deliberation, adopted the ideas incorporated in the drawings submitted by J. E. Tourtellotte & Company, architects. The building as adopted would cost, finished and furnished, about $2,000,000.

As the first bill only carried a small appropriation of money with it, and as the site selected was the site of the present capitol with a block of ground to the west added, the commission decided to construct the building in units, locating the central or monumental unit in the center of Seventh Street, Boise, which would allow of the use of the old capitol until the officers could move into the central section of the new capitol. On account of the inadequacy of the appropriation, very little progress was made on the construction until 1911, when the Legislature appropriated $750,000 to finish the central unit.

Contracts were immediately let and the central or monumental unit is now complete. The illustrations show the character of the work of this completed portion. Some of the illustrations shown are for the proposed wings, for which it is hoped the present Legislature now in session will appropriate the sum of $750,000 to complete the entire building.

The architects of the building, Tourtellotte & Hummel (same firm which won competition; name changed recently), believe that an architectural composition should express some thought or idea which is of vital interest or moment to those for whom it was constructed; the same as is a literary or musical composition. Buildings of this type are monumental in their character, and the principle or paramount reason for their existence is to impress the beholder with the greatness, magnificence and grandeur of the Deity or commonwealth, or both, as the case may be, which it represents. The building should be impressive and dignified on the exterior and interior and the materials used should be of such kinds as will assist in this impression, with the added quality of being enduring.

In this building that idea was in the minds of the architects, and the results fairly approximate their ideal.

The base course, grand entrance steps, etc., are of Vermont gray granite; the superstructure is of a dense, hard gray sandstone, the most beautiful stone of its kind in the world. The roof coverings are of tile and terra cotta, with copper flashings where required.

The roof covering of the dome is of terra cotta the same color of the sandstone in the balance of dome and building.

The construction is massive exterior bearing walls, with steel columns and beams between. The dome is a structural steel frame with a reinforced concrete covering over, waterproofed and in turn covered with terra cotta.

Steel is fireproofed with concrete. Floor slabs are of reinforced concrete. Partitions, where heavy brick masonry walls do not occur, are of tile. Building is fireproof.

The building is finished in the interior in marble and mahogany. A greater amount of marble is used in the finishing of the interior of this building than in any building of its size, perhaps, in this country. Rotunda, corridors and all public space has marble floors and the major portion of the side walls are covered with marble. Private rooms and offices are finished in mahogany with a marble base around all of these rooms. Toilet rooms and lavatories are finished with tile floors, marble partitions and side walls. Ornamental ceilings, cornices, etc., of stucco made from rock gypsum plaster.

The central power building, located 300 feet to the rear of the capitol, is constructed of stone, and has a stack of radial vitreous gray brick, 125 feet in height.

In this building there are water tube boilers, steam engines, direct and alternating electric generators, which

heat, cool, ventilate and operate the elevators and illuminate the capitol, connected to same through a reinforced concrete tunnel 6 feet by 6 feet 7 inches in size. In this power house is located the main switchboard of marble, which controls the current for the lights, motors, etc., in the main building.

The capitol building is heated with the exhaust steam by both direct and indirect radiation. The ventilation system supplies all rooms with fresh, warmed air. The lighting systems in public space is decorative. Offices have artistic fixtures of solid cast bronze.

There is a vacuum cleaning plant located in the basement. Plumbing fixtures are of solid porcelain ware throughout.

The furniture of the building is of massive mahogany of special design. Furnishings and drapings are of rich, plain materials in colors to harmonize with the deep green and gray veinings of the marble.

There has been no attempt to explain the design or the detail, as the illustrations do that partially, and much better than could be done by words.

The central unit has cost the State about $1,100,000, and the completed building will come within the amount first contemplated, $2,000,000.

Justice cannot be done the interior by photographs, as vistas are all that a person can get with a camera, and the grand and majestic effect of the rotunda and public space, when seen as a whole, will have to be left to the imagination of the reader, by the putting of these vistas together and seeing them as a whole in his mind's eye.

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Italian Building at the P.-P. I. E.

The participation of Italy to the Panama-Pacific Exposition will be very extensive and as complete as never before in any other exposition outside of Italy. The "Daily L'Italia" recently received for the first time the complete plans and drawings made by Marcello Piacentini, the famous Roman architect selected by the Italian Government and Commissioner General Ernest Nathan. According to these plans, Italy will not be represented by one pavilion, as is the case of all nations when they participate to foreign expositions, but it will be a most original group of several handsome and artistic edifices, with plazas, porticos, arches, gardens, statuary, monuments and columns, towers, etc., giving both the actual appearance and the atmosphere of an Italian city. Said edifices will represent the most remarkable style of Italian architecture at different ages, but they will be harmonized so as to give a beautiful ensemble and a perfect idea of a quarter of an Italian city. The site given to Italy is that large irregular triangular space facing on one side of the Fine Arts Building, and on another side the Avenue of Nations, and Architect Piacentini adapted his plans to this area which measures 165,000 square feet, of which fully 60,000 will be covered with buildings.

At the entrance of the Italian exhibit there will be a beautiful Italian garden with a wide stairway leading to a large square nearly 250 feet wide and 400 feet long, on the three sides of which will be three palaces in three different styles—Venetian, Lombard and Etruscan. In the Etruscan and Lombard palaces there will be exhibited special industries and manufactures of Italy, whereas the Venetian salon will be a sort of municipal building used especially for social functions and receptions, and will contain also historical relics and inventions of great Italians from Dante to Marconi. At the rear of these buildings there will be another plaza, on one side of which will be the official exhibit of the Italian Government and on the other side will rise the Italian Home, an interesting series of magnificent halls and rooms of different styles both in construction and adornment. Facing the plaza will be an octagonal temple called the "Tribune," which the author of the project says will be a sort of sanctuary of the Italian section, for there will be exhibited most precious and interesting relics and documents pertaining to the great Italian explorers and navigators from Christopher Columbus to the Duke of Abruzzi. A large building adjoining the Venetian palace will contain a hall devoted to moving pictures, which will be shown without charge every day and which will show the natural beauties of Italy, Italy's most valuable and rare treasures of art and also films reproducing the work in the most important Italian mechanical and industrial establishments, especially navy yards, foundries, silk and woolen mills, etc.

Around all these buildings there will be beautiful Italian gardens, fountains, niches, statuary, etc.

Besides this characteristic special exhibit representing a portion of an Italian town, Italy will exhibit also in the various departments of the International Fair, as in the Machinery Building, transportation, electricity, etc. The Italian Parliament has approved an expenditure of $400,000 and very likely this amount will be increased if necessary.

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Oregon State Building at the P.-P. I. E.

The location of this building is an ideal one, which faces on the Esplanade along San Francisco Bay, bordering on the avenue between the reservation of State buildings and the site of the main exposition building.

It is surrounded by buildings costing several hundred thousands of dollars, such as the California Counties building on the east, New York State building on the south, and the New Jersey State building on the west. Hence the limited appropriation requires originality of design, impressiveness of mass and simplicity of detail. Therefore the use of Oregon timber is the most impressive result.

The exterior design follows general lines of Parthenon at Athens, the masterpiece of architecture of all time, but the details of construction follow those of the earlier struction of wood, of which the Parthenon was to a great extent a reproduction in stone. The building is entirely surrounded by colonnades, ten columns on each end and sixteen columns on each of the sides, and the ground space over all is 150 feet by 250 feet.

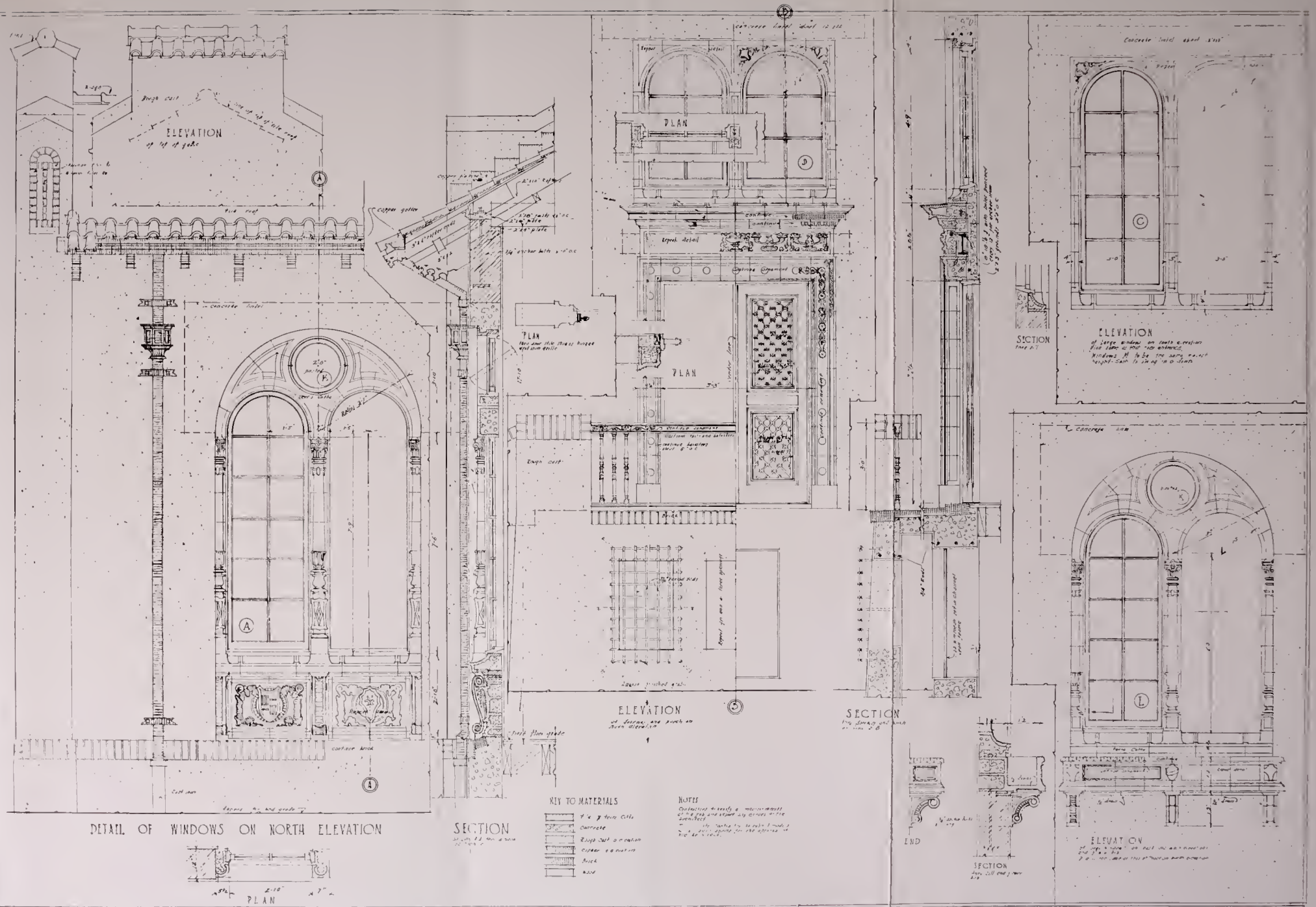
The entrances are on the north and south sides, with large foyer at each, with stairways on either side of the south foyer.

The first floor contains a lecture hall, lounging room, location for publicity department and the remainder given to exhibits.

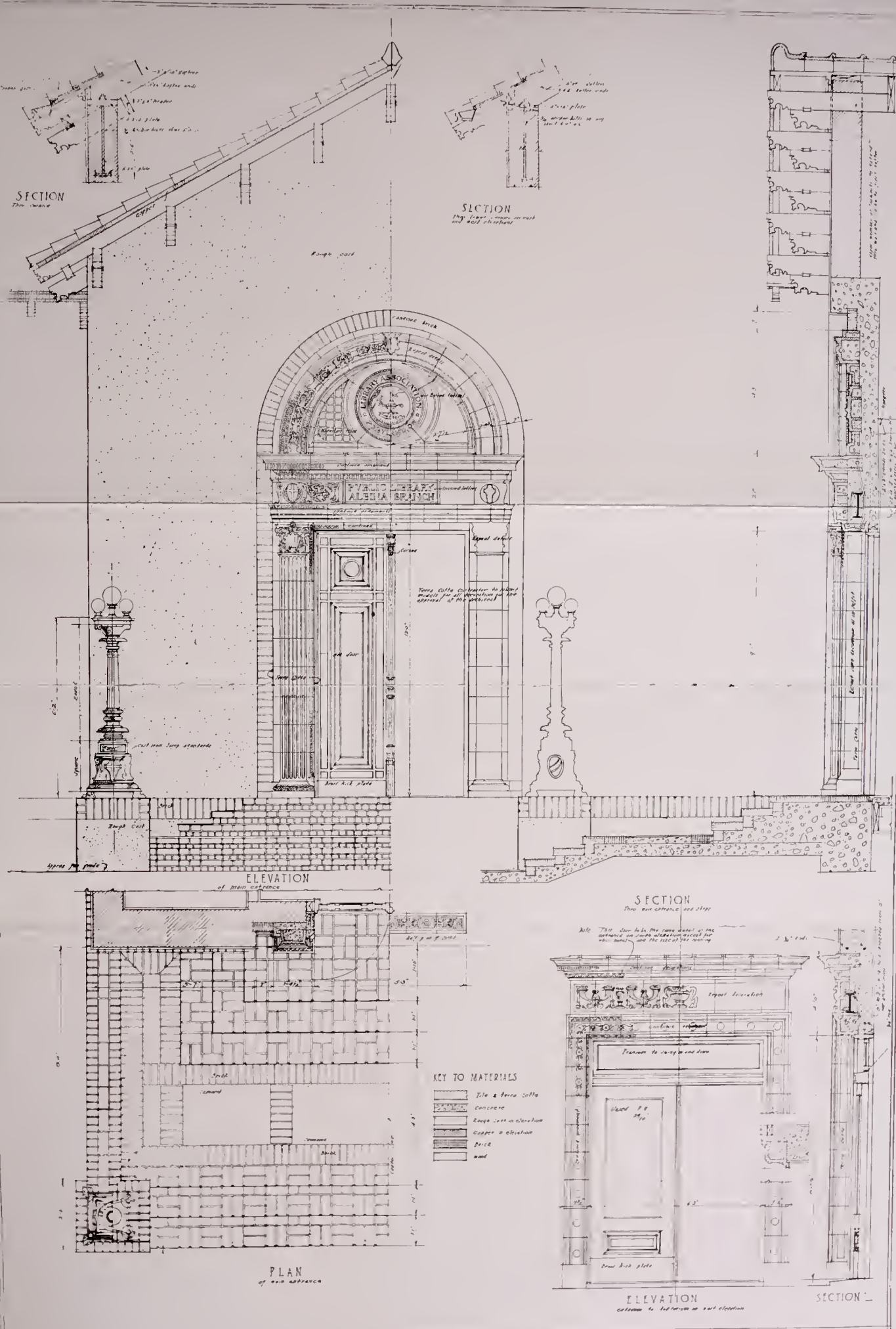
On the second floor, surrounded by a central court, lighted from the roof, is located the Art Gallery for exhibits of Oregon arts and crafts, literature, domestic science rooms, dining room, kitchen and the remainder of exhibits.

Its exterior display represents Oregon's greatest industry, and the interior represents modern products of Oregon manufacture and industry. Moving pictures will be shown of Oregon scenes and various industries.

As Oregon was the first state to select a site, the location is admirable and grounds surrounding the building will represent the cultivated, also wild flowers and shrubbery which abound in the State.

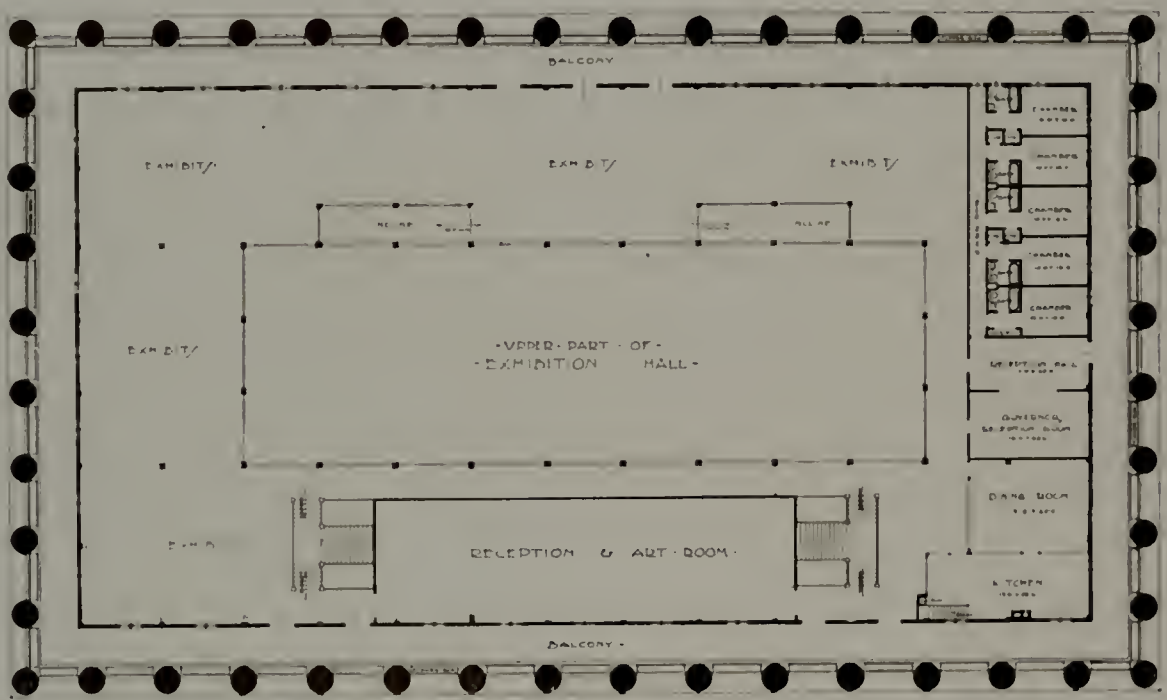


Detail of Public Library, Albina Branch, Portland, Oregon
Ellis F. Lawrence, Architect, Portland

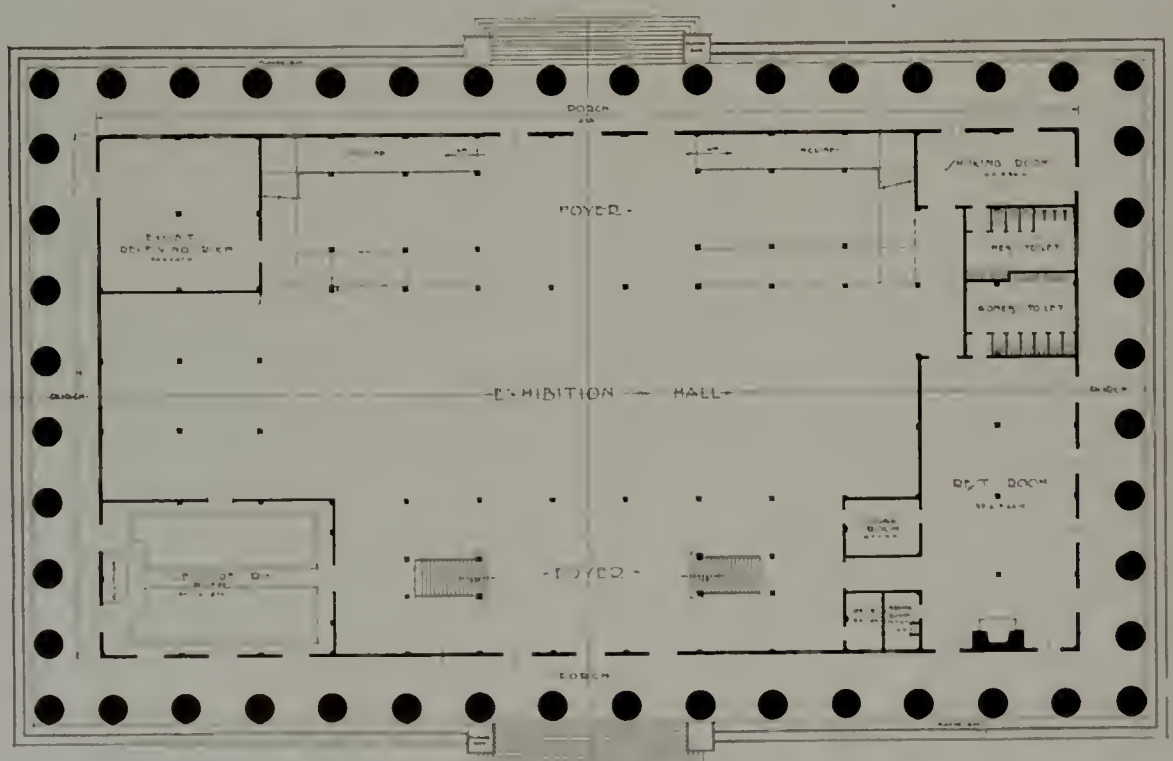


Detail of Public Library, Albina Branch, Portland, Oregon
Ellis F. Lawrence, Architect, Portland

Oregon State Building, P.-P. I. E., San Francisco, California
Foulkes & Hogue, Architects, Oregonian Building, Portland, Oregon



Second Floor Plan, Oregon State Building, P. P. I. E.



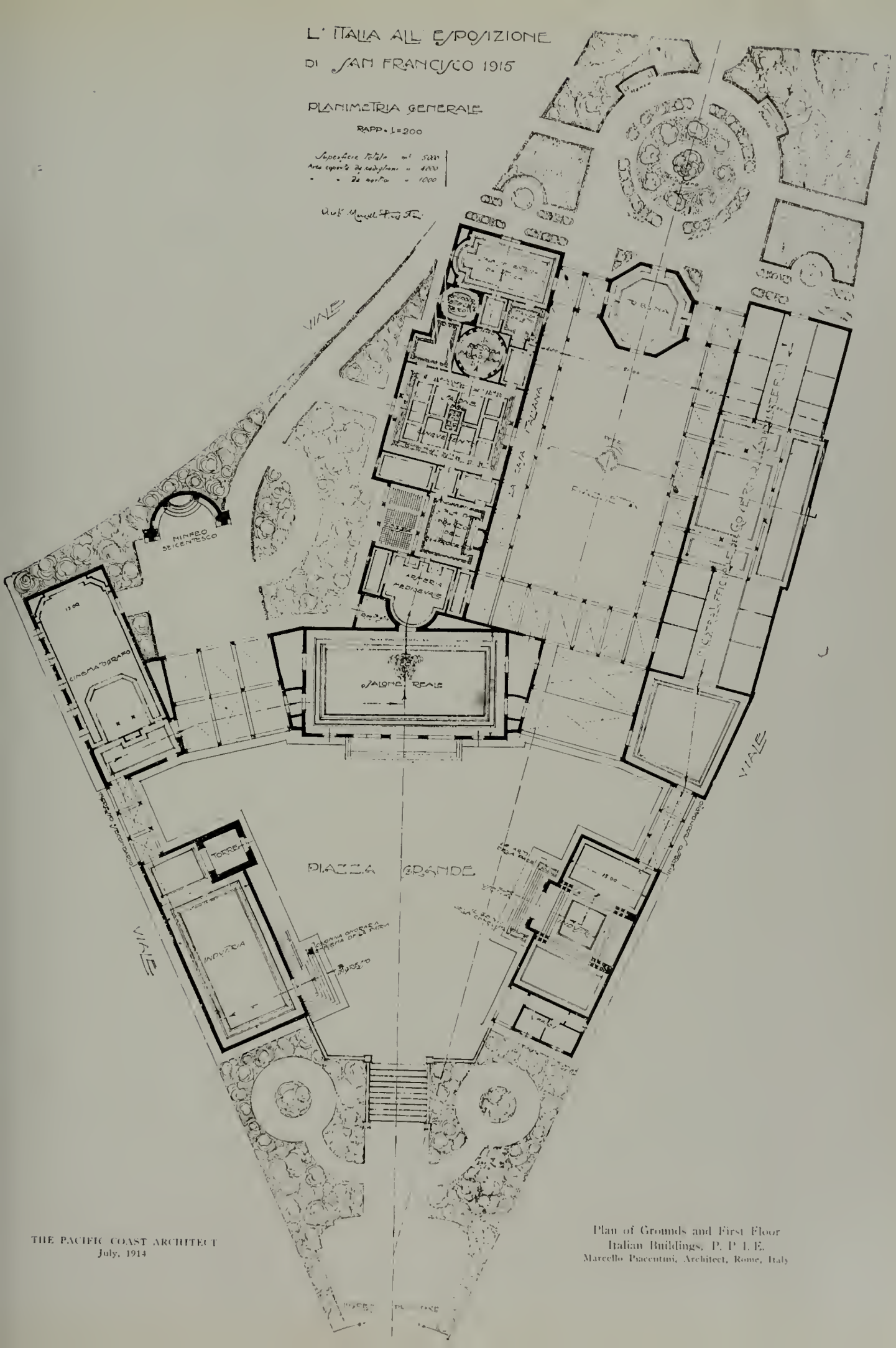
First Floor Plan, Oregon State Building, P. P. I. E.

Lawton & Hoffne, Architects, Oregonian Building, Portland, Oregon

Perspective Showing Three Italian Buildings at P.-P. I. E

Marcello Piacentini, Architect, Rome, Italy

Perspective Group of Italian Buildings at P.-P. I. E.
Marcello Piacentini, Architect, Rome, Italy



THE PACIFIC COAST ARCHITECT
July, 1914

Plan of Grounds and First Floor
Italian Buildings, P. P. I. E.
Marcello Piacentini, Architect, Rome, Italy

Indiana Building, Panama Pacific Exposition, San Francisco
J. T. Johnson & Co., Architects, Indianapolis, Indiana

Competitive Design for the Massachusetts State Building at the Panama Pacific Exposition
Wm. A. Bass, Architect, Boston, Massachusetts

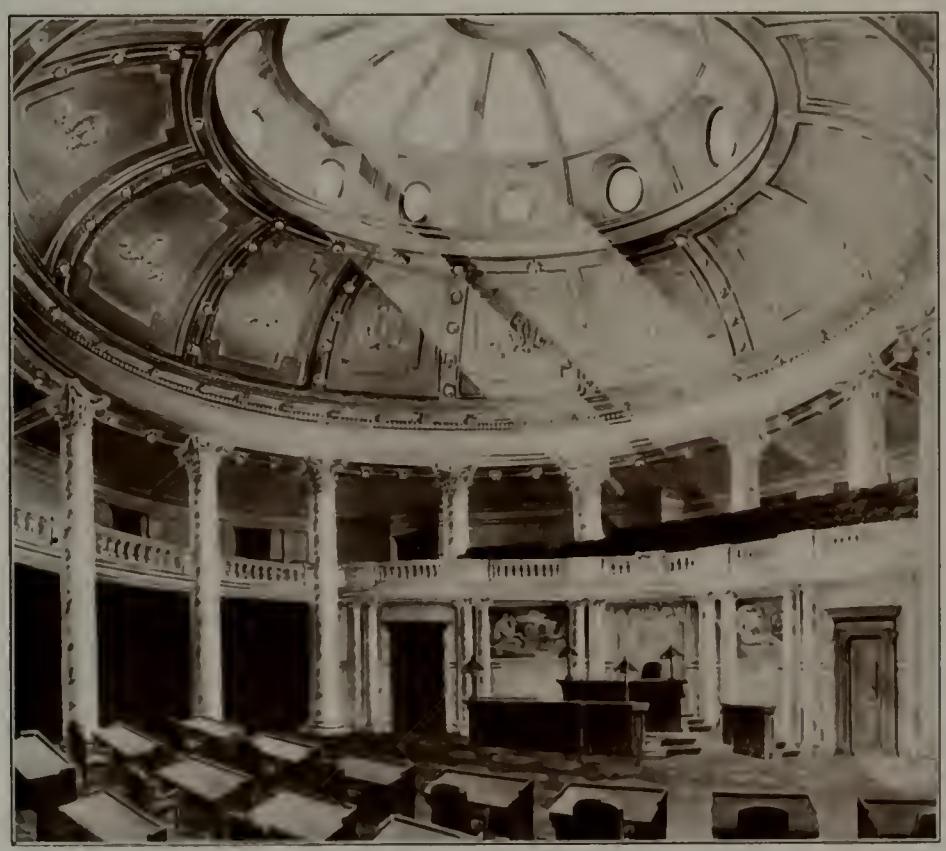
Idaho State Capitol, Boise, Idaho
Tourtellotte & Hummel, Architects
Boise, Idaho, and Portland, Oregon

Jefferson Street Elevation of Completed Central Section

Capitol Building Illuminated Idaho State Capitol, Boise, Idaho
Tourtellotte & Hummel, Architects

Corinthian Capitals Rotunda, Third Floor, Idaho State Capitol, Boise, Idaho
Tourtellotte & Hummel, Architects

Governor's Reception Room



House of Representatives, Idaho State Capitol, Boise, Idaho

Tourtellotte & Hummel, Architects

Head of Grand Staircase, Third Floor

Grand Staircase, Vestibule Entrance, First Floor, Idaho State Capitol, Boise, Idaho
Tourtellotte & Hummel, Architects

Supreme Court Room

Statuary Hall, Third Floor, Idaho State Capitol, Boise, Idaho
Tourtellotte & Hummel, Architects

Looking Toward Rear Wing, First Floor Rotunda

Colonnade and Judges' Chairs, Supreme Court

Idaho State Capitol, Boise, Idaho
Tourtellotte & Hummel, Architects

Head of Grand Staircase, Second Floor

Staircase, First Story, Rear Wing

Idaho State Capitol, Boise, Idaho
Tourtellotte & Hummel, Architects

Jefferson Street Portico

Judges' Private Corridor

Idaho State Capitol, Boise, Idaho
Tourtellotte & Hummel, Architects

Entrance Steps, Jefferson Street

Grand Approach, Idaho State Capitol, Boise, Idaho

Tourtellotte & Hummel, Architects

"THE PACIFIC COAST ARCHITECT" is the official organ of the San Francisco Chapter of the American Institute of Architects.

San Francisco Chapter, 1881—President, G. B. McDougall, Russ Building, San Francisco, Cal. Secretary, Sylvain Schnaittacher, First National Bank Building, San Francisco, Cal.
Chairman of Committee on Public Information, William Mooser, Nevada Bank Building.
Chairman of Committee on Competition, Geo. B. McDougall, 235 Montgomery St.
Date of Meetings, third Thursday of every month; annual, October.

OTHER PACIFIC COAST CHAPTERS OF THE AMERICAN INSTITUTE OF ARCHITECTS.

Southern California Chapter, 1894—Vice-President, A. C. Martin, 430 Higgins Bldg., Los Angeles, Cal. Secretary, Fernand Parmentier, Byrne Building, Los Angeles, Cal.
Chairman of Committee on Information, W. C. Pennell, Wright & Callender Bldg., Los Angeles.
Date of Meetings, second Tuesday (except July and August), (Los Angeles).

Oregon Chapter, 1911—President, Morris H. Whitehouse, Wilcox Building, Portland, Ore.
Secretary, Ellis F. Lawrence, Chamber of Commerce Building, Portland, Ore.
Chairman of Committee on Public Information, Ellis F. Lawrence.
Date of Meetings, third Thursday of every month, (Portland); annual, October.

Washington State Chapter, 1894—President, James Stephen, 726 New York Block, Seattle, Wash. Secretary, Arthur L. Loveless, 513 Colman Building, Seattle.
Chairman of Committee on Public Information, Chas. H. Alden, 513 Colman Bldg., Seattle (till further notice send all communications to Arthur L. Loveless, 513 Colman Building, Seattle.)
Date of Meetings, first Wednesday (except July, August and September), (at Seattle except one in spring at Tacoma); annual, November.

Colorado Chapter, 1892—President, Gecorge H. Williamson, 528 Majestic Bldg., Denver, Colo. Secretary, Arthur A. Fisher, 459 Railway Exchange Building, Denver, Colo.
Chairman of Committee on Public Information, Arthur A. Fisher, 459 Railway Exchange Bldg., Denver, Colo.
Date of Meetings, first Monday of every month (Denver, Colo.); annual, September.

THE AMERICAN INSTITUTE OF ARCHITECTS.
The Octagon, Washington, D. C.

OFFICERS FOR 1914.

President ..... R. Clipston Sturgis, Boston, Mass.
First Vice-President ..... Thomas R. Kimbal, Omaha, Neb.
Second Vice-President ..... Frank C. Baldwin, Washington, D. C.
Secretary ..... D. Knickerbacker Boyd, Philadelphia, Pa.
Treasurer ..... John L. Mauran, St. Louis, Mo.

BOARD OF DIRECTORS

For One Year

Irving K. Pond, Steinway Hall, Chicago, Ill.
John M. Donaldson, Penobscot Building, Detroit, Mich.
Edward A. Crane, 1012 Walnut St., Philadelphia, Pa.

For Two Years

Burt L. Fenner, 160 Fifth Ave., New York, N. Y.
C. Grant LaFarge, 25 Madison Sq., N., New York, N. Y.
H. Van Buren Magonigle, 7 West 38th St., New York, N. Y.

For Three Years

Octavius Morgan, 1126 Van Nuys Bldg., Los Angeles, Cal.
W. R. B. Willcox, Central Bldg., Seattle, Wash.
Walter Cook, New York, N. Y.

Auditors

Thomas J. D. Fuller, 806 Seventeenth St., Washington, D. C.
Robert Stead, 906 F Street, Washington, D. C.

SAN FRANCISCO CHAPTER, A. I. A.

The regular monthly meeting of the San Francisco Chapter of the American Institute of Architects was held at the St. Germain Restaurant on Thursday afternoon, June 18th, 1914. The meeting was called to order at two o'clock by Mr. Geo. B. McDougall.

There were fifteen members present.

MINUTES.

The minutes of the regular meeting of May 21st were read and approved.

STANDING COMMITTEES.

Board of Directors:

The Secretary, for the Board of Directors, read a list of members who were delinquent in their dues, and which was submitted to the Chapter.

Sub-Committee on Competitions, A. I. A.:

Mr. Mooser, for this Committee, submitted a written report, which was read, accepted and placed on file; and on motion duly made, seconded and carried, this report was ordered printed in full with the minutes, and the particular attention of the members called to the matters contained therein.

San Francisco, Calif.

The San Francisco Chapter,
American Institute of Architects,
San Francisco, Calif.

Dear Sirs:

The San Francisco Sub-Committee on Competitions, A. I. A., respectfully begs to submit the following report:

Your Committee finds, with reference to a competition recently held for the Webber Memorial at Stockton, that while the program contained features which were in accordance with the Institute's code, it also embodied conditions which no architect should accept; and furthermore, was not approved by the Sub-Committee on Competitions. Many of our members participated in this Competition, and the Committee is informed that Messrs. Arthur Brown, Willis Polk and Clarence Ward acted as Judges. The two latter being Institute members.

Another matter brought to the attention of the Committee is the Competition for the Richmond Canal Sub-Division. Although reported in press clippings that Hobart and Cheney were the advisers, the program only calls for Mr. Cheney as adviser. This Competition, although more for landscape architects than otherwise, there is nothing to comment upon other than the fact that the conditions of the program did not conform to those of the A. I. A.

This Committee has had under consideration for quite some time, the matter of the Competition for the Elks Hall in Berkeley, and which Mr. Ratcliff is the architect. After a good deal of correspondence in the matter, in which Mr. Ratcliff maintained that no competition existed, there is no doubt that a competition was held, and this Committee believes that Mr. Ratcliff should be cautioned about again entering unauthorized competitions.

It is the conclusion of this Committee that it is manifestly unfair for certain members of an organization pledged to support a well defined attitude towards Competitions to participate in unauthorized competitions, while other members show a proper support by their refusal to compete. The Chapter should not be called upon forever to warn its members of flagrant violation of its mandates. We know that in the majority of cases it is only necessary to call to the attention of those desiring to institute a competition, that we, as a Chapter, are ready and willing to give advice on the subject in its early stages, to have the matter finally in proper shape. If all architects would follow this advice when such matters come to their attention, there would be no reason for reports of this character.

A recent instance of trustees requiring a competition and being properly advised is that of the Kentfield School. It was possible within a few hours to provide a satisfactory program and have the same approved by the Committee. Although this building is of small cost, the competition was presumed to be mandatory by the State law, and there is on doubt that the conclusion of the same will be satisfactory, alike to the trustees and the participants.

Respectfully submitted,
SAN FRANCISCO SUB-COMMITTEE ON COMPETITIONS.
A. I. A.
By WILLIAM MOOSER.

Wednesday, June 17, 1914

Sub-Committee on Public Information:

Mr. Mooser, for this Committee, stated that the subscription price of the Institute Journal had been raised to $5.00 a year, but that those members availing themselves of subscribing before July 1st could obtain the Journal for $3.50.

Architectural League and Education:

The Secretary reported that he was in receipt of a bill for dues in the Architectural League, and wished instructions as to the Chapter's desire in the matter.

Chamber of Commerce Committee:

The Secretary reported that he had attended a meeting of the Chamber of Commerce to promote the Ocean Esplanade.

Civic League Committee:

The Secretary reported that he had attended the last meeting of the Civic League.

Other Standing Committees:

No report.

SPECIAL COMMITTEES.

Committee on the Revision of the Constitution and By-Laws:

It was duly moved, seconded and carried that the amendment to the By-Laws proposed at the meeting of January 15th, 1914, be circulated among the members for affirmative signature. The amendment to be carried if the number of affirmative signatures received correspond to the number of affirmative ballots necessary to carry, as at present provided for in the By-Laws.

COMMUNICATIONS.

The following communications were received, and ordered placed on file:

Letter from Mr. De Vere Vining Deuel, resigning from the Chapter; from D. Knickerbacker Boyd, Secretary of the American Institute of Architects, letter in re proper addressing of Chapter minutes; letter authorizing deferment of any action on the matter of Standardizing Advertising, as per a resolution passed by the Board of Directors, A. I. A., on May 15, 1914; further communication from him informing the San Francisco Chapter of his destruction, as Secretary, of all matters concerning the trial of three members of this Chapter; another letter from Mr. Boyd relative to the "matter of Standardizing the sizes of advertising matter" Letter from Mr. C. H. Whitaker, Editor of the Journal, in reference to subscriptions to that publication. Communications from John D. Works and Geo. C. Perkins, Senators, and from Wm D Stephens, E. A Hays, John E. Raker, John D. Nolan, D. S. Church, Julius Kahn, C. F. Curry and F. H. Blackford, Representatives in Congress, all signifying their approval of the stand taken by the Institute relative to the government building at Washington, D. C., and their willingness to assist in any way. Further communication regarding the same matter, together with letter sent him from the Secretary of the Treasury, McAdoo, from John I. Nolan, House of Representatives.

UNFINISHED BUSINESS.

There was no unfinished business.

NEW BUSINESS

In the matter of the list of delinquents, the Secretary was directed to send a registered notice to members on the list, giving them until the next meeting to pay up or be dropped from the Chapter for indebtedness.

In the matter of the Institute Journal, the Chair appointed Messrs. Schroepfer, Devlin and Lofquist a Committee to investigate the matter and report their findings to the Chapter.

It was duly moved, seconded and carried that if the bill from the Architectural League was a current indebtedness that the same be paid, but that the Chapter take action on the question of remaining in the League before further indebtedness is incurred.

On request of the Institute the Chair appointed Mr. Willis Polk, Chairman, and Messrs. Ward and Barth to act as the San Francisco Sub Committee on Contracts and Specifications of the Institute.

On motion of Mr Hatch, which was duly seconded, the Secretary was instructed to send a letter to Mr. Frick, congratulating him on his success at the Beaux Arts.

ADJOURNMENT.

There being no further business before the Chapter, the meeting adjourned at 3:05 o'clock

Subject to approval,

SYLVAIN SCHNAITTACHER, Secretary.

SOUTHERN CALIFORNIA CHAPTER, A. I. A.

The seventy-third meeting of the Southern California Chapter of the American Institute of Architects was held at the Hollenbeck Cafe, Los Angeles, California, on Tuesday, June 9, 1914

The meeting was called to order at 7:45 p. m. by Vice President V C Martin The following members were present

1. V. L. Acker
2. J. E. Allison
3. J. J. Backus
4. P. A. Eisen
5. W. E. Erkes
6. Lyman Farwell
7. Chas. F. Helmle
8. John C. Hillman
9. Frank D. Hudson
10. J. W. Krause
11. John P. Krempel
12. V. C. Martin
13. B. M. Morris
14. O. W. Morgan
15. S. T. Norton
16. Robert H. Orr
17. Fernand Parmentier
18. H. M. Patterson
19. W. C. Pennell
20. T. F. Power
21. A. F. Rosenheim
22. J. C. Smith
23. P. J. Van Trees
24. Albert R. Walker
25. F. R. Schaefer

As guests of the Chapter were present V. W. Rea and Charles Gordon, local architects; A. C. Schaefer of St. Louis; Harry Hes and John Bowler of the Builder and Contractor; W. E. Prine and H. X. Hensley of the Southwest Contractor

The minutes of the seventy-second meeting of members were read and approved.

For the Committee on Civic Improvements, A. F. Rosenheim reported that the committee had become affiliated with the Los Angeles City Planning Association, which body planned to ultimately prevail upon the City Council to appoint a City Planning Commission.

W. C. Pennell reported on behalf of John C. Austin of the same committee, stating that the latter had been appointed a member of the City Planning Committee of the Los Angeles Municipal League, and that this association was receiving reports on the subject from a number of civic bodies with the intention to use same in the framing of a joint report to be presented to the Los Angeles City Council.

For the special committee appointed to report on the case of J. Martyn Haenke, A. F. Rosenheim stated that Mr. Haenke, being absent from the city and unable to prepare his defense, the committee was not in position to present a complete report.

For the Committee on Institute Membership Mr. J. C. Hillman reported a possibility of three prospective Institute members.

For the Committee on Institute Membership, Mr. J. C. Hillman letter of regret from A. M. Edelman, who, owing to illness, was unable to deliver his lecture before the Chapter at this meeting.

For the Committee on Public Information, A. R. Walker read a communication from the chairman of the A. I. A. Committee on Public Information with reference to the new regime that the Institute Journal will be subjected to after July 1, 1914

On the Secretary's announcement that he had received a bill from the Institute's Publication Committee for subscription of the Chapter members en bloc to December 31, 1914, at the rate of $1.00 per anum per member, a discussion followed

John P. Krempel moved, seconded by F. D. Hudson, to instruct the Secretary to write to the Institute Publication Committee explaining this matter.

W. C. Pennell moved an amendment that the Chapter pay the subscription bill for its membership en bloc to July 1, 1914, allowing each member individually to subscribe for the Journal after that date ad libitum. This amendment, seconded by A. R. Walker, was carried.

A. R. Walker next reported that the Chapter's Committee on Information had held a meeting with a joint committee of the Los Angeles Builders' Exchange and the Credit Men's Association.

The object of the latter organization is to hold a picnic, inviting this Chapter to participate. A communication to this effect was read from the Builders' Exchange, setting as the date for this meeting June 20, 1914. The report was further supplemented by remarks from R. A. Eisen. The invitation was accepted on motion made by John P. Krempel, seconded and duly carried, and the chairman appointed the Chapter's Committee on Public Information to cooperate with the Chapter's Entertainment Committee in order to effect all necessary arrangements for this coming picnic John P. Krempel to be the chairman of the Chapter's joint committee

Communications were next read as follows:

From Charles F. Lummis Secretary of the S. W. Society of Los Angeles, Cal., requesting this Chapter's membership dues for the year 1914

A telegram from Washington, D. C., from Octavius Morgan, assuring the Chapter that he would comply with its request with reference to the Institute Convention of 1915

From the American Civic Association, Washington, D. C., requesting assistance towards certain expenses of the Association

From D. Knickerbacker Boyd, Secretary of the A. I. A., instructing the Chapter's Secretary with reference to a change in the forwarding of the copies of the minutes.

Another communication from the Secretary of the Institute requesting the Chapter to defer action on the matter of standardizing the sizes of advertising matters.

Communications from Senators and Representatives of Southern California, in answer to communication from this Chapter with reference to the buildings for the Department of Justice in Washington, D. C.

From Charles H. Cheney, with reference to local civic improvements. This communication was ordered by the chairman turned over to the Chapter's Committee on Civic Improvements

From the Institute's City Planning Committee, by Elmer Grey, which was also ordered turned over to the Committee on Civic Improvements.

From Frank Niles Day, chairman of the Standing Committee on Contracts and Specifications of the Institute, requesting this Chapter to appoint three Institute members on contracts and specifications. The chairman announced that he would appoint a committee later.

From Miss Annie B. Picher, director of the Boundary Stone League, acknowledging this Chapter's endorsement of petitions to the State of California and to the United States Government with reference to boundary and highway monuments.

Under the head of new business the question of quantity surveying was brought up, O. W. Morgan, Jr., reporting a communication from the Institute Committee on Quantity Surveying. Mr. Morgan thought it not advisable to force matters with reference to quantity surveying at the present moment. A lengthy discussion on the subject followed by various members.

The meeting adjourned at 11 p. m., subject to the call of the chair.

FERNAND PARMENTIER, Secretary.

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OREGON CHAPTER, A. I. A.

Meeting held at the Commercial Club, May 21, 1914. Called to order by President Whitehouse.

The following members answered the roll call: Messrs. Whitehouse, Naramore, Mayer, Holford, Doyle, Johnson, Thompson, Allyn, Fouilhoux, Williams, Beckwith, Hoffman, Hogue, Emil Schacht, Whitney, Smith and Lawrence.

There were present as guests J. H. Freedlander of New York and A. F. Adams of Spokane.

Mr. Whitehouse extended the greetings of the Chapter to Mr. Freedlander and the New York Chapter.

Mr. Freedlander spoke on the reputation of the Oregon Chapter in the East for high standing of professional ethics. He reviewed the Portland postoffice competition and Government architecture. He expressed himself as believing that a satisfactory adjustment of the auditorium controversy would be made within a day or so.

Mr. Mayer moved and Mr. Doyle seconded that the minutes of the last meeting be accepted as printed. Motion carried.

REPORTS OF COMMITTEES.

Committee on Municipal Plans and Affairs, Mr. Johnson, chairman, reported that nothing specific had been done because of the very excellent work of the other committees which had covered the field. Mr. Whitehouse called attention to the proposed permanent concrete arches and Mr. Doyle reviewed the designs which the Chapter had prepared gratis for the Rose Festival decorations.

Committee on Competition, Mr. Mayer, chairman, reported as follows:

"In regard to the conduct of the authorities of O. A. C., the chairman of this committee sent a request to four of the architects who had been interested in the proposed work to give this committee whatever information they could which might be of value in dealing with similar cases in the future.

"Mr. Knighton and Mr. Whitehouse, of Whitehouse & Fouilhoux, have complied with this request, sending to your chairman copies of all the correspondence which was held between them and the authorities of O. A. C.

"In regard to the Panama Exposition building, no attempt has been made to secure additional information to that which the Chapter has at present, but if desired the data at hand might be summed up in a report.

"An invitation competition for an armory at Eugene limited to four architects was recently brought to the attention of this committee. Two of the architects invited are Chapter members. The program of the competition was written in a manner which forbid Chapter members from competing. The essential features in which the program was lacking are: "1—The matter of an architectural advisor. 2—A provision for a proper jury. 3—The established fee of 6 per cent.

"An effort has been made to correct the program or supplement it in such a way as to meet with the approval of the Institute practice, so that the Chapter members might find it possible to compete.

"Accompanying this report will be found the program of the above completion and whatever correspondence has been referred to."

Report ordered filed.

Committee on Building Laws, Mr. Fouilhoux, chairman, reported as follows:

"I beg to submit the following report on the work of the Committee on Building Laws: I sent to each member of the committee and forwarded to each member of the Chapter the advance copy of the proposed tenement house code which will come up for public hearing before the commission on the 22d of this month.

"At a meeting of our committee we had a discussion on the general provision of the ordinance. While it was realized that a good amount of this provision would work a hardship on the owners of property, this is naturally to be expected from any progressive ordinance. However, the most drastic part of the ordinance is the one requiring outside windows for bathrooms. This is a matter which I would like to see discussed at a meeting of the Chapter if time can be found for such discussion."

Report ordered filed.

Committee on Public Information, Mr. Lawrence, chairman, reported that the Committee on Public Information had prepared an exhibit at the Reed College Conference, showing on Card 1 what the Chapter had done for the city and on Card 2 what the Chapter intended to do for the city in 1915. The cards read as follows:

CARD 1.

The City Plan—Assisted in financing, in formulating and in obtaining the voters' approval of the Bennett plans.

Fireproof School Houses—Investigated cost of American school houses in campaign against fire trap structures.

Building Laws—Aided in revisions, especially as to limitation of heights, fire protection, housing, Board of Appeal, etc.

Rose Festival—Submitted a scheme for street decoration and architectural accessories.

Interstate Bridge—Offered to assist the County Commissioners in an advisory capacity, without professional charges, in securing architectural beauty on new bridge. (To date offer has not been accepted.)

Excess Condemnation Legislation—Assisted the Greater Portland Plans Association in its endeavor to pass such legislation.

Charter Revision—Sought to have included in new charter, as was done by previous Charter Revision Commissions, a provision for an Art and Building Commission, with strong veto powers as to location and design of city buildings and works of art. Contrary to assurances received, the measure was not placed before the voters with the new charter.

City Commissions—Assisted Commissioners Brewster and Dieck in forming their advisory committee on matters pertaining to the city plan, etc.

Professional Standards—Improved by annual architectural exhibition and catalogues, by student work in architectural design, by preventing architectural competitions from being held under questionable and unfair rules, by holding a convention of coast architects.

CARD 2.

The City Plan—Stimulate interest by furnishing the press with pertinent news items supplied by the Committee on Public Information of the American Institute of Architects.

School Houses—Urge slight revisions in building code reducing cost to taxpayers without danger to safety.

Building Laws—Assist commission in charge of revisions by the expression of our Committee on Building Ordinance.

Public Commission—Offering the services of our committees to assist in architectural problems.

Legislation—Urging the formation of an Art and Building Commission to protect the city plan; urge the passage of laws facilitating public improvements, such as excess condemnation.

Professional Standards—Hold an architectural annual; continue to assist the Portland Architectural Club Atelier in its night work for architectural students; give financial aid to an architectural scholarship fund carrying with it an annual traveling fellowship; continue to fight architectural competitions conducted by corrupt officials, and to urge that architects for public work be chosen by fair competitive methods.

Report ordered filed.

SPECIAL COMMITTEES.

Committee on Quantity Survey, Chester Hogue, chairman, reported as follows:

"The resolution on the quantity survey previously reported and amended in accordance with the suggestions of the various organizations to which it was submitted now reads as follows: 'Believing the present method of bidding on proposed buildings to be unjust to the owner, the architect and the contractor, we herewith submit for your approval the adoption of the quantity survey method.' By this we mean the owner, asking for bids, be required to submit with his plans and specifications a complete list of the quantities, which quantities shall be and become a part of the contract.

"The Oregon Chapter, A. I. A.; the Oregon Society of Engineers and the Builders' Exchange of Portland have appointed committees on the quantity survey, and at a meeting of the committee which prepared the original resolution, held May 19th, it was decided by those present, as the best way to further the subject, to submit the resolution in its final form to the chairman of these three committees at a meeting to be called for that purpose, and thereafter for each committee to work in its own organization, the committee keeping in touch with each other through their chairmen."

Report ordered filed.

Rose Festival Committee, Mr. Doyle, chairman, reported that the next move should be made by the Festival Association, as they have in their possession the designs prepared by the Chapter. He

had Mr. Woodard's assurance that the association would give the matter early attention.

Mr Williams reported for the Rose Festival Parade Committee that he conferred with Mr Logan, the President of the Architectural Club, and that at present it looked as though the Club and Chapter might join in making a feature He promised a later report.

READING OF COMMUNICATIONS

Resolutions read from the Builders' Exchange protesting against the elimination of arbitration clause in the contracts between the School District and the contractors.

Mr Naramore explained the causes for the elimination of the arbitration clause and stated that the attorney for the School District ruled that the wording used in the existing contracts does not take away from the contractors their rights in the courts.

Mr. Lawrence stated that the Executive Committee had approved the resolutions of the Builders' Exchange because of their reference to the standard documents of the American Institute of Architects.

Mr. Williams stated that there were many reasons why the arbitration clause should be retained.

Invitation was received from the Secretary of the Illinois Chapter of the A. I. A. calling the Oregon Chapter's attention to their meeting to be held on May 8th.

In response to the Secretary's request for information, Mr. D. Everett Waid of New York wrote on the proposed legislation in New York State for registering architects.

Referred to Legislative Committee.

In answer to the Secretary's request, Mr. Pilcher, State Architect of New York, wrote concerning existing laws creating the office of State Architect in New York State.

Referred to Legislative Committee.

Communications from Edgarton Swartout, chairman of the Committee on Government Architecture, read, requesting that the Chapter take up with the Oregon Senators the matter of competition for Government buildings, and especially the matter of the architectural award for the Department of Justice, Mr. Sturgis, the President of the Institute, having been unable to secure assurance from the Treasury Department that it would abide by the results of the competition.

Statement prepared by Mr. Swartout was forwarded to Senators Chamberlain and Lane by the Secretary, with a request that they give the matter their immediate attention in the interests of fair play.

Proceedings of the Eleventh Annual Convention of the Iowa Chapter were received.

Communication was received from Sullivan Jones of the Institute Committee pertaining to quantity survey.

Referred to Chapter Committee on Quantity Survey.

Invitation received from Mr. Shurtliff, Secretary of the National Conference on City Planning, requesting the participation of the Oregon Chapter in the National Conference on City Planning to be held in Toronto in May

An invitation from the St. Louis Chapter was received requesting the attendance of the members of the Oregon Chapter at the masque and pageant to be held on the evenings of May 28, 29, 30 and 31 in St Louis.

Communication written by the Secretary to County Commissioner Holman, calling the Commissioner's attention again to the offer of the Oregon Chapter to assist the Commission in the architectural design of the bridge and inquiring if an architect had been employed to date.

A communication from W L. Crissey of the Oregon Development League, enclosing a letter from John Regan of Harbor, Ore., read, calling attention to a blue granite rock deposit in his country.

Data received by Mr Lawrence as member of the Competition Committee of the Institute from Mr Medary was brought before the meeting and referred to the Competition Committee of the Chapter The documents were the records of a meeting of the Boston Society of Architects on April 7th and a copy of a speech delivered by Mr Alfred Stone in 1874

The meeting was adjourned by motion of Mr Mayer and Mr Lawrence

WASHINGTON STATE CHAPTER, A. I. A.

Owing to prolonged absence in San Francisco, where he is connected with the Architectural Department of the Panama Pacific International Exposition, Mr Charles H Alden has resigned as President of the Washington State Chapter and Mr James Stephen has been appointed by the Council to serve for the remainder of the term

The June meeting will take the form of an outing, at which the Tacoma architects will be the guests of the members of the Washington State Chapter It is planned to take an automobile trip over the boulevards, make a visit of inspection to the Tuberculosis Hospital, a visit to some of the new residences at the Highlands, and end the day with dinner at the Firlock Club June 13 is set as the date of the outing

Mr C W. Bullard of Tacoma has been honored by his Alma Mater by being elected to honorary membership in Alpha Rho Chi, Anthemios Chapter, of the University of Illinois, the first national intercollegiate professional fraternity in the United States.

Mr. W R B. Willcox, member of the Board of Directors of the American Institute of Architects, has just returned from a meeting of the Board at Washington, D C

The Chapter holds an informal weekly lunch every Thursday and this feature is proving to be a popular institution, enabling the members to become better acquainted than is possible at the regular monthly meetings, where much of the time is necessarily devoted to formal business.

ARTHUR L. LOVELESS, Secretary

The History of a Tinplate House

(These facts are made public for the first time by special arrangement with Messrs. N. & G. Taylor Company.)

In these days of huge corporations and organized companies representing widespread interests in every branch of business, it is of distinct interest to record at least one case where an old-time house, established more than a century ago, has steadfastly maintained its independence and individuality, still continuing in the same line of business as a private firm.

The record of the house of N. & G. Taylor Company has been one of continuous, signal success in the tinplate industry. The business has been handed down from father to son—no less than four generations of Taylors having been connected with the firm. No reference to the roofing-tin industry of this country would be complete without mention of this house. Since the early days of the roofing-tin industry they have consistently advocated the use of good tin, and have shown greater activity than any other house in presenting the advantages of good roofing-tin to roofers, contractors, architects, and property owners themselves. As a natural result, they have built up a business that has made them the largest manufacturers of high-grade roofing-tin in this country.

General view of new tinning department, showing the excellent lighting facilities. All handling of material done by overhead traveling crane. The tinning stacks are located in the recesses along either side of the building.

The house was founded in 1810 in Philadelphia, by William Taylor, grandfather of the present members of the firm, who with his brothers, George Taylor and Tracy Taylor, embarked in the venture of selling tinplate, tinware, metals, and kindred articles of all kinds—a venture that was destined to meet with such marked success.

These founders of the company were staunch patriots from Connecticut, near Hartford and Glastonbury, and one of them had served in the militia of that State during the War of 1812, later joining his brothers in Philadelphia, who had started the business there.

In 1830 the firm sold the first terne plates for roofing purposes ever made. We quote from the United States Census Report for 1902:

"In that year (1830) small quantities of lead-coated sheets were made in an establishment located on Market

Pickling department, N. & G. Taylor's, Cumberland, Md., works. Here the black sheets are cleaned with a weak solution of acid and thoroughly washed in clean water before being transferred to the various tinning stacks. These black plates are a special quality made at the Taylor works from the pig iron through to the finished sheet.

Street, Philadelphia, and used for covering roofs. The plates made in the Philadelphia establishment were 10x14 inches, the standard commercial size in those days. Imported English tinplates were used instead of blackplates. They were first put together and run through a bath of molten lead, the tin on the plates serving as a holder for the lead. The plates were sold for roofing purposes, and were of excellent quality. The quantity produced, however, was not very large.

"Regarding the sale of these plates, the N. & G. Taylor Company, of Philadelphia, says: 'News of the sale of so novel an article soon found its way across the water, and terne plates commenced to be made there.'

"The manufacture of terne plates did not become an important branch of the tinplate industry until America began to use this material for covering roofs."

In 1845 the father of the present members of the firm, Nathan Taylor, together with his cousin, George E. Taylor, a son of George Taylor, were admitted to the firm—the old people retiring a few years later. The present company has in their possession old catalogues published about this time, which are of remarkable value to those who are interested in the practice and customs of former days. It is evident from one of these catalogues, published in 1857, that the company already occupied an important position in the industry, as we note a record of premiums being awarded them at the following exhibitions:

The American Institute, 1843, '47, '48, '49, '50, '51, '52 and '53.

Hartford County Agricultural Society, September, 1843; October, 1847; and October, 1848.

Maryland Institute, October, 1848, and 1851.

Massachusetts Mechanics' Fair, Boston, 1850.

New York State Fair, 1850.

The Exhibition of the Industry of All Nations at the Crystal Palace, London, England, 1853.

The tools and machines used by tinners in the early days were crude and rough in design, and improved forms were designed by the company about this time, many of which are still in use at the present day, the rights of manufacture having been transferred to the makers of tinners' tools and supplies. Many of the awards mentioned above were made for these improved tools. These tools were lighter, neater and of far more practical use than the heavy, clumsy tools of English make.

Nathan Taylor died in 1861, leaving his partner, George E. Taylor, who, with his brother, William Y. Taylor, continued the firm of N. & G. Taylor, adding the word "Company" to the title, making the present title date from that time.

About this time, catalogues and circulars published by the firm mentioned the facilities offered by the new Atlantic cable in importing supplies of tinplate promptly from the English works. As a matter of interest, the first code-word adopted by the company was the word "pleasure," indicating that "tinplates are advancing." The charge for this single word at that time was five dollars.

A catalogue published in 1868 calls particular attention to the new size for roofing tin just introduced by this house, namely 28x20 inches. Frequent mention is made of this latest novelty, and its distinct advantage to the roofer, in N. & G. Taylor Co.'s advertising at that time. In this same catalogue is found a description of another novelty, namely—Bessemer steel tinplates for stamping purposes. The catalogue states that "these steel tinplates are altogether a novelty, and originally introduced by our-

The machine method of making tinplate. Only one unskilled operater required to feed the black sheets into the machine. All the processes of tinning, handling and cleaning conducted automatically thereafter, the finished sheets being delivered on the stand shown at the left in the illustration.

selves; they are well suited for stamping, requiring a thinner gauge than if they were iron."

The catalogue frequently calls attention to the marked advantages of roofing tin, such as:

"Next in importance to a good FOUNDATION for our Buildings is a GOOD AND PERMANENT ROOF.

"The fact will be proved by investigation that the proportion of new buildings covered each year is not as great by one-half as that of buildings requiring to be

RE-ROOFED, which is a sure evidence of a serious defect in roofing material used. The subject is one of great importance to Architects, Builders, Owners or Occupants. Many other kinds of roof covering have been adopted, but none have proved satisfactory. Tinplate is undoubtedly the best as yet discovered, and our new sizes of roofing plate are particularly desirable as being a great saving of service and labor over the old size of 14x20 inches."

The company's products were awarded premiums at the Paris Exposition in 1867. An elaborate catalogue published in 1875 devotes even more space to the use of good roofing tin as a durable, fireproof, weatherproof material for covering buildings. One of the illustrations from this catalogue is reproduced herewith, to illustrate the marked advantages of tin over shingles and gravel. We learn from this catalogue that

"When we introduced our 28x20 roofing we hardly thought it would so popularize itself as to drive 14x20 out of the market, but it was so well adapted for rapid and perfect roofing that we have never been able to fully keep pace with the demand.

"28x20 bright tinplate originating with ourselves, is now coming into general use for all kinds of tinware, and in fact taking the place of the old sizes. A greater variety of patterns can be cut from it. Its use saves labor, solder and material, and we have always in stock the largest possible variety of brands suitable for all kinds of work; 10' thickness to D 5X."

At the Franklin Institute Exposition in 1874 we exhibited the largest sheet of tinplate ever made, also samples of the first leaded plate ever made, taken from a roof in Philadelphia, where they had been for forty years, and as perfect as when put on. This was the leaded tin made in Philadelphia in 1831, before it was ever made in Wales. Other curiosities exhibited were samples of No. 40 sheet iron, shown under glass, the thinnest ever made. Also ordinary articles of tinware made of 6X and 8X tinplate, and replated by being dipped into molten tin. Also very valuable drawings from a work published in 1720, showing the method of making tinplates at even an earlier period.

These old catalogues constantly urge roofers and manufacturers to favor American industries wherever possible. American built ships were used for the imports of tinplate, and when Philadelphia Russia iron was first made, Messrs. N. & G. Taylor Company were the first to sell it. They were the first houses therefore that ever sold American tinplate and sheet iron, introducing it through Eastern Pennsylvania and New York City. One of our advertisements of this American Hammered Russia Iron contains the significant prophetic inquiry: "Why go to Russia for iron when we have mountains and mountains of it here?"

This catalogue of 1875 mentions some buildings in Philadelphia "covered with tin during the latter part of the last century, and the roofs have not been repaired since. One was covered in 1795 and the roof to-day is in as excellent condition as when put on. Throughout Canada it is a common thing for a tin roof to be in perfect condition after the lapse of a century."

Should space permit we should like to give many other quotations from these interesting old catalogues, which are of interest not only to the older roofers, whose experience extends back to those years, but to the younger generation, to whom this history of the industry is of particular significance.

At the Centennial Exposition at Philadelphia in 1876 N. & G. Taylor Company's products were awarded the premium for extra-fine quality tinplate. In addition to the extensive exhibit made by this company, they also sold the roofing tin for covering nearly all the Exposition buildings, most of the work being done by Mr. G. W. Dorsey, of Wilmington, Delaware, who is still living. This was one of the largest contracts for tin roofing ever let. Using the new Burritt's Hand Seamers, all previous records were surpassed in completing the work.

George E. Taylor died in 1882, when the present members of the firm, together with George W. B. Taylor (deceased 1899) have continued the business up to the present time.

The full "seven open pot, palm oil, hand dipping stack," an exclusive process employed only by the N. & G. Taylor Co. Used only in making the Target and Arrow brand of roofing tin. This is the old time process formerly employed in the company's works in Wales. All work done by hand, four skilled workmen being required. By this process the coating is slowly and thoroughly applied in successive layers on the sheet, resulting in an exceptionally durable roofing plate.

After the McKinley protective tariff went into effect they were among the first to commence the manufacture of roofing tin in this country. This was in 1891. A year or two later an extensive tract of land was secured in the southern portion of Philadelphia and the present tinplate works erected there.

This tinplate works was the largest and best equipped plant in this country at that time, for the manufacture of tinplate of all kinds, and continued in active operation up to the Fall of 1913, when this entire department was transferred to Cumberland, Md., where the company's open-hearth furnaces, rolling mills and black plate plant had been located a number of years before.

The new tinning department at Cumberland is said by those who are in position to know to be the last word in tin-house construction in this country. The company now controls at its complete works at Cumberland, Md., all the processes of manufacture, from the pig iron and pig metals to the finished sheet. They are able to give careful, personal attention to all the intricate processes of manufacture. They continue, as in former years, to be the leading house for high-grade roofing tin in this country, and are always closely associated with any movement for the betterment of the industry.

In a private industry of this nature a deep-rooted family pride exists, which is too often lacking in large industrial corporations and stock companies. The business is under the direct personal management of the members of the family, and the old time reputation for fair dealing and good value in their tinplate is carefully guarded and valued.

Their "Target-and-Arrow" brand of roofing tin, formerly known as "Taylor Old Style," has established so widespread a reputation for satisfactory service on the roof that as a matter of common business judgment the company is bound to maintain the original high standard of that brand at all hazards. This they have done, steadfastly refusing to cheapen the quality of the tin to meet price competition.

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Digest of Business Conditions

FAVORABLE.

1. **Crop Outlook** never better. Record winter wheat crop practically assured. Other crops have a good start, acreage large and ideal weather conditions. Some damage to cotton crop is reported, but believed to be unimportant.

2. The **rate decision** cannot be much longer delayed and is daily expected. Prospects that the Commission will authorize some increase in the railroad rates, enabling the largest consumer of iron and other metals and their products to resume purchases.

3. The prospect that the **Fall election** will return a Republican majority, and tie the present Administration's hands in regard to radical legislation in business for the succeeding two years and give the business interests of the country a rest.

4. **Labor condition** improved in the cities by the call from the farming districts for hands to harvest what are expected to be record crops. Fewer strikes and labor demands caused by appreciation of labor of the existing business depression.

5. Unusually large **cash reserves** and **deposits** in banks awaiting employment and investment the moment confidence is restored.

6. **Federal Reserve Board** nominations meet approval of banking and business interests of the country and the machinery getting rapidly in shape to begin operations.

7. Every prospect of some settlement of the **Mexican situation** without our being involved in war with that country, which settlement will improve conditions, and make for increased trade and a greater development of the mineral resources of our neighbor and increased American business opportunities.

8. The thoroughly **liquidated condition of business.** The stocks of commodities in manufacturers' and consumers' hands being very small and prices at a low level.

UNFAVORABLE.

1. President Wilson's determination to carry through his program of **anti-Trust legislation,** before the adjournment of Congress, in the face of the unanimous protest of the Chambers of Commerce and the business interests of the country.

2. The exhibition in the House of Representatives of the passage without a dissenting vote of the Webb amendment of the Clayton anti-Trust bill, which exempts labor unions and farmers' alliances from the operations of the Sherman Act, or with a purpose of deceiving the beneficiaries into such a belief—virtually making one law for business and capital and another for labor.

3. The growing **lack of confidence** of the country in its representatives at Washington, irrespective of party. The complete failure of the President and his advisers to appreciate the seriousness of the state into which business has drifted, and which President Wilson, in spite of the concrete condition of stagnation in trade and closed factories, describes as purely psychological.

4. Increase in imports—decrease in exports, and consequently a trend towards **unfavorable trade balances.**

5. The **discouraged feeling of business interests,** with its accompanying lack of courage and enterprise. The feeling that we are in for hard times. The apparent conclusion that only natural conditions and the intelligence and patriotism of the people will work a cure, and which therefore will be a very slow operation.

6. **Decreasing immigration**—smallest in six years except 1911.

7. The fact that industry has suffered so long not only from the reduced volume of business, but from losses, that unless a change comes soon, what has gone before will be demonstrated by **increased failures.** This is shown in the scrutiny which accompanies the granting of credits, in spite of plenty of unemployed surplus funds.

8. No decrease in the **cost of living,** while the lessened employment increases not only the economy but the distress of many in the ranks of labor, on whose prosperity depends the prosperity of the country.—The Steel and Metal Digest.

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Short Cuts in Steel Weights

To find the weight of square or flat iron or steel bars, multiply the sectional area of the bar by 10/3, which will give the weight in pounds per lin. ft. Add 2 per cent for steel. For example, in the case of an iron bar 1½x½ inches:

3/2 multiplied by ½ multiplied by 10/3 equals 5/2, or 2½ pounds per lin. ft.

For steel, add 5/100, equals 2.55 pounds per lin. ft.

In the case of round steel bars, to find the weight per lin. ft., divide the square of the number of quarters of an inch in diameter by 6. For example, in the case of a steel bar ¾ inch in diameter:

3 squared (three being 3 quarters) equals 9, divided by 6 equals 1½ pounds per lin. ft.

These short methods are useful when a handbook is not readily available.—Iron Age.

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Oregon Architects Honored

The American Institute of Architects, through its Board of Directors, meeting in Washington, has declared the following Oregon architects, members of the Oregon Chapter of the American Institute of Architects, elected to associate membership in the American Institute of Architects:

A. E. Doyle, of Doyle & Patterson.
Wm. G. Holford, of Lawrence & Holford.
Joseph Jacobberger, of Jacobberger & Smith.
W. C. Knighton, State Architect.
D. C. Lewis.
F. A. Naramore, architect for School District No. 1, Multnomah County.

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Trade Notes

Architect A. G. Rigg of Spokane, Wash., has moved into new offices at 521 Peyton building.

Architect H. J. Payton, formerly at Saskatoon, Can., has recently moved to Prince George, B. C.

W. W. Teal, architectural designer, has moved his office from room 514 to 414 Lissner building.

Architect Ernest L. Norberg has recently opened offices at 605 Howard avenue, Burlingame, Cal.

Architect A. H. Memmler of Monrovia, Cal., now has an office at 520 South Broadway, Los Angeles.

Architect L. F. Hyde of Oakland has moved from the First National Bank building to the Dalziel building.

Architect E. P. Antonovich has moved from 333 Kearny street to 422 Monadnock building, San Francisco.

Architect S. B. Zimmer, formerly of Santa Ana, Cal., is now at 1700 New Hampshire avenue, Los Angeles.

Architect R. C. Sweet has moved from room 416 Realty building to 312 Mohawk building, Spokane, Wash.

Architect E. Fillingham, formerly of North Battleford, has opened offices on George street, in Fort George.

Griffith, Barlabaugh & Co., architects of Dallas and Paris, Tex., have opened an additional office at Wichita Falls, Tex.

Arthur Brown, Jr., of San Diego, Cal., has been licensed by the State Board of Architecture to practice in the State.

Architects Douglas & Hartman of San Diego, Cal., have moved into larger quarters at 708 Timken building, from room 608.

Architect W. C. Hays has moved from the Foxcroft building to larger quarters at 1321 First National Bank building, San Francisco.

Architects C. H. Skidmore and A. Schroepher have moved into 827 Foxcroft building, which adjoins the one previously occupied by them.

Architect J. H. Rudy of Melville, Sask., was successful in the competition for plans for both the R. C. separate school building and the new St. Joseph's hospital building, to be erected in Melville immediately.

C. C. McKim of Waco and Wayne Patterson of Temple have formed an architectural copartnership under the firm name of McKim & Patterson, in suite 208 Cameron building, Waco. We wish them the success that they are so justly entitled to.

Architect Hubert Frohman has left for a tour of several countries abroad, including France, Italy, Spain and England, where he plans spending several months in architectural research, chiefly ecclesiastical design and construction, returning about October.

Ellis F. Lawrence, F. A. I. A., and Mr. William G. Holford are associated in business at 1021 to 23 Chamber of Commerce building, Portland, Ore., which is the former office of Mr. Ellis F. Lawrence. The new firm name will now be known as Ellis F. Lawrence and W. G. Holford, associate architects.

Architect Octavius Morgan has just returned from a trip abroad, where he spent nearly six months, during which time he visited not only his old home in England, but also all the principal cities of the Old World. During his short stay away Mr. Morgan marveled at the rapid growth of Los Angeles in the past half year. The office was in the hands of his son, Octavius, Jr.

United Materials Co. have removed from the Balboa Building to room 5, Crossley Building. They will have large adjoining rooms, where an excellent display will be made of their terra cotta tile and pressed brick, manufactured by the Los Angeles Pressed Brick Co., Frost Building, Los Angeles. They also represent the Atlas Portland Cement Co., New York, makers of "Atlas White," and F. W. Bird & Sons, East Walpole, Mass., makers of "Neponset" products."

Mr. A. Campbell, President of the Campbell Building Co., Salt Lake City, was in San Francisco recently en route to Hilo, Hawaii. The Campbell Building Co. has the contract to erect the United States Government post-office, custom house and court house at Hilo. Mr. Campbell has purchased approximately 6,000 barrels of "Santa Cruz Portland Cement" for these buildings from the Santa Cruz Portland Cement Co., Crocker Building, San Francisco.

Post's Corona Drawing Paper won out in the recent City Hall competition and this paper will be used exclusively in the City Engineer's and Architect's office for the ensuing fiscal year.

Corona won on its merits, as many other brands were offered at much lower figures, but the award was made strictly on account of its quality.

The new victory is another proof of the high character and quality of the drawing papers manufactured by The Frederick Post Co.

Mr. A. C. Soule, manager of the Simplex Window Co., recently returned from a trip to Fresno, Cal., and informs us he has closed contracts to supply their "Simplex Windows" in all the new school houses to be erected in Fresno. Approximate cost of buildings $500,000. Mr. Soule also states their windows are to be placed in eight new high schools at different places in Southern California. Two schools and the ten-story California Fruit Building in Sacramento, also several buildings in Stockton, State building at Folsom and Napa, building for the Deaf and Dumb in Berkeley, and a hall at the Experimental Farm in Davis.

Harmony among employees not only makes for increased efficiency from an employer's standpoint, but it adds pleasure to their work and often makes otherwise irksome tasks attractive. The employees of W. P. Fuller Co. believe in this doctrine, and, to further this feeling of harmony, they take an annual outing, in which the store and office force, factory and warehouse employees and all others connected with the firm participate in a body. This year's outing will be held on July 19th at Glen Cove. A steamer, chartered for the occasion, will convey them to the grounds, where dancing, games and athletic contests will be enjoyed and a bounteous luncheon served. The effect of these outings is felt throughout the year, and no doubt contributes largely to the prosperity of the firm.

Berry Brothers, Detroit, have just issued "Varnish Specifications" for architects' use, giving the specification for various woods and various uses. They give the following facts on covering capacities:

"A gallon of varnish will cover approximately 600 square feet, one coat.

"A gallon of shellac will cover from 500 to 600 square feet.

"A gallon of water stain covers about 500 square feet on open-grained woods, and on close-grained hard woods, 50 square feet more; on soft woods a gallon will cover from 400 to 500 square feet.

"A gallon of Spirit Stain will cover from 300 to 400 square feet.

"A gallon of oil stain will cover about 550 square feet.

"From 6 to 8 pounds of Paste Filler made up to volume of one gallon will cover approximately 300 square feet of surface.

"A gallon of Shingletint covers about 160 feet, one coat if brushed on; 1½ gallons cover the same surface, two coats. From 2¼ to 2½ gallons of Shingletint will dip 1,000 shingles and another gallon is enough for a brush coat in addition after the shingles are laid."

CALIFORNIA

Pasadena—Architects Greene & Greene, Boston Building, have been commissioned to prepare plans and specifications for a residence to be erected on South Orange Grove Avenue for William E. Hamlin of Syracuse, N. Y. The house will be one of the finest in Pasadena.

Long Beach—Architects Train & Williams, 226 Exchange Building, Los Angeles, have prepared plans for a municipal auditorium to be erected at Long Beach. The auditorium will seat about 6,000 people.

Architect C. Ben Sholes, Curtis Building, Long Beach, has been commissioned to prepare plans for the construction of a church for the Second Presbyterian Church of Long Beach to be erected at the northwest corner of Elliott and Molino Avenue at a cost of $9,850.

Arcata—Architect W. H. Weeks, 75 Post Street, San Francisco, has completed plans for the construction of a four-story and basement brick and steel construction hotel at a cost of $50,000.

Santa Barbara—Architects Ray & Soule, 1206 State Street, have been commissioned to do the architectural work for the American Trona Corporation, which is erecting an extensive plant for the manufacture of borax at Searles Lake.

Red Bluff—Architect R. A. Herold of Sacramento has prepared plans for the construction of a reinforced concrete jail building at a cost of about $27,000.

State Architect George B. McDougall, Sacramento, has been commissioned to prepare plans for one- and two-story and basement frame and reinforced concrete hospitals for the State of California at the various State institutions at a cost of about $117,000.

San Francisco—Architect Frederick H. Meyer, Bankers' Investment Building, has prepared plans for the construction of a five-story and basement Class C apartment house for Walter S. Sullivan to be erected at Sacramento and Taylor Streets at a cost of $45,000.

Architect Houghton Sawyer, Shreve Building, San Francisco, has nearly completed plans for a seven-story and basement Class A apartment house.

Architectural Designer O. E. Evans, 2367 Mission Street, is preparing plans for the construction of a six-story and basement brick and steel hotel to be erected on Taylor Street, near Sutter, and will cost $80,000.

Architect Edw. T. Foulkes, Crocker Building, San Francisco, has plans nearly ready for the construction of a six-story Class C hotel building to be erected at the corner of O'Farrell and Leavenworth Streets at a cost of $40,000 for Dr. F. C. Keck.

Alameda, Cal.—Architect Eugene K. Martin, 2192 Shattuck Avenue, Berkeley, has completed plans for a three-story and basement Class C construction church at the corner of Dana & Haste Streets for the First Baptist Church of Berkeley at a cost of $50,000.

Los Angeles—Architects Parkinson & Bergstrom, Security Building, have completed plans for a twelve-story and basement steel frame bank and office building to be erected at Fifth and Spring Streets for the Commercial Fireproof Building Co.

Architects Morgan, Walls & Morgan, Van Nuys Building, are completing plans for alterations to the second floor of the Garland Building, 746 South Broadway, for the Kaspare Cohn Commercial and Savings Bank. A large fire and burglar proof vault will be installed.

Architect Robert H. Orr, 340 Van Nuys Building, Los Angeles, is preparing preliminary drawings for a two-story and basement reinforced concrete store and rooming house building to be erected at the corner of Bertie Street and Garey Avenue, Pomona, for F. E. Harrison of that city.

Banning—Architect C. H. Russell, 500 Union League Building, Los Angeles, has completed plans and specifications for the new high school building to be erected at Banning. It will be a one-story and high basement structure of brick construction and concrete foundation and will cost about $18,000.

Hyde Park—Architect G. A. Howard, Jr., 712 Grant Building, Los Angeles, has practically completed plans for the new grammar school buildings to be erected at Hyde Park. There will be five buildings of hollow tile construction and will cost $60,000.

Willows—Architects Bliss & Faville, Balboa Building, San Francisco, are preparing plans for the construction of a one-story and basement reinforced concrete postoffice for the United States Government at this place.

Corona—Architects Allison & Allison, 1405 Hibernian Building, Los Angeles, have prepared plans and specifications for the construction of a sixteen-room grammar school at Corona to be erected at 603 South Main Street.

OREGON

Portland—Architects Beezer Bros., Northern Bank Building, Seattle, have submitted plans for the proposed Gothic style church for the Dominican Fathers, Union Avenue and Clackamas Street, to cost $150,000.

Plans and specifications are being prepared by Jacobberger & Smith, architects, Board of Trade Building, for the proposed new building to be built on the block bounded by Congress, Bryant and Albina and Dekum Avenues in Piedmont for the Sisters of the Good Shepherd. The estimated cost is placed at $125,000.

Plans for the proposed Knights of Columbus Building will be prepared by Architects Jacobberger & Smith, Board of Trade Building, at a cost of about $50,000.

Eugene—Architects Hunzicker & Breusse, Eugene, were commissioned to prepare the plans and specifications for the proposed armory building to be erected at this place for the Oregon National Guard at a cost of $52,000.

Mercy Hospital will build a $15,000 training school building to be of brick or concrete, located at the corner of Twentieth and Lawrence Streets. Four architects have been selected to submit plans in competition.

Aurora—Architects Houghtaling & Dougan, Henry Building, have been commissioned to prepare plans and specifications for a two-story and basement building to be erected at Aurora, Ore., for Kraus & Son of that place.

WASHINGTON

Seattle—Architect John Graham, Lyon building, Seattle, has prepared plans for a five-story and basement Class A apartment house for Mr. D. R. McKay, at a cost of $150,000.

Architect A. Warren Gould, American Bank building, Seattle, has completed plans for a three or five-story and basement Class A court house, the estimated cost of which is $950,000.

Port Angeles—Plans are being prepared for the construction of a two-story and basement, reinforced concrete court house at Port Angeles, at a cost of $50,000.

Seattle—Architect A. Warren Gould, American Bank building, has nearly completed plans for a two-story and basement brick and terra cotta residence for Mr. Albert J. Rhodes, at a cost of $15,000.

Seattle—Architect A. Wickersham, Lyon Building, has completed plans for the construction of a four-story and basement brick and mill hotel for the Yesler Estate, which will cost $75,000.

Architect Louis Mendel has been commissioned to prepare plans for a six-story building of which four stories will be constructed at the present time, to be erected on the southeast corner of Fifth Avenue and Pine Street for John F. O'Shea and James B. O'Shea of Portland.

Tacoma—Architects Heath & Gove have prepared plans for the construction of the proposed $125,000 apartment house for the Ansonia Realty Co.

Olympia—Plans are being prepared in the architectural department of the O. W. R. & N. Co. offices at King Street, Seattle, for the construction of a two-story $15,000 brick and stone depot.

MISCELLANEOUS

Vancouver, B. C.—Architects Sharpe & Thompson, London building, are preparing plans for the construction of the proposed Science building at the new University of British Columbia, at Point Grey. It will be of concrete and $500,000 has been appropriated for the work.

Architects Milton & Gillingham, 413 Granville street, have prepared plans for the construction of an eight-story and basement hotel building on Hastings street W., near Columbia, for A. Clemes, to cost $150,000.

North Vancouver, B. C.—Architect W. C. F. Gillam, of the Architectural firm of Bryan & Gillam, North West Trust Bldg., Vancouver, has prepared plans for the proposed Central School Building, in North Vancouver, to cost about $116,000.

Victoria, B. C.—Architect J. C. M. Keith, of Victoria, has been commissioned to prepare plans for the proposed new home building for the Seaman's Institute.

New Westminster, B. C.—Architects Gardiner & Mercer have prepared plans for the construction of a three story and basement brick and stone court house addition at this place, to cost $60,000.

Helena, Mont.—Architect Geo. H. Carsley has prepared plans for the construction of a Horticultural building at Montana State Fair Grounds, to cost $25,000.

Tucson, Ariz.—Architect Henry Jaasted prepared the plans for the construction of the new Odd Fellows Hall, to be erected on North Sixth avenue.

Phoenix, Ariz.—Architects Mayberry & Parker, 472 Pacific Electric building, Los Angeles, are completing plans for an eight-story reinforced concrete office building to be erected in Phoenix, Ariz., for Dwight B. Heard, at a cost of $200,000

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THE PACIFIC COAST ARCHITECT

A·MONTHLY·JOURNAL·FOR·THE ARCHITECTURAL · INTERESTS

SAN FRANCISCO
CALIFORNIA

VOLUME EIGHT
NUMBER TWO

AUGUST, 1914

Boston Varnish Company

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Fuller Varnishes

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HEATING

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STOVES

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Steilacoom Lake, Wash.

Architect
L. JAY KNAPP
Los Angeles, Cal.

Roofer
EDWARD MILLER
CORNICE AND ROOFING CO.
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THIS is not a Shinto temple from the Island Empire of Japan, but an original idea for a Summer cottage among the pines of Washington. We show it as an excellent example of the well-known adaptability of tin roofing to irregular curved surfaces. The tin roofing not only carries out the architectural effect perfectly, but also provides an exceedingly durable and fireproof roofing. It can also be painted to harmonize with the color scheme of the building.

The architect has carried out the Oriental design faithfully, even to the chimney.

The question arose about the original specifications on this residence and to verify the fact that "TARGET AND ARROW" Roofing Tin was used on this job, the following letter is reproduced

"Mr. J. A. Drummond, Tacoma, Wash., Jan. 8, 1911.
San Francisco, Cal.

Dear Sir:

In reply to yours of the 5th inst. will state that there was a Malthoid roof on Mr. Long's residence with 3 inch half round rolls over the seams, but the roof leaked like a sieve, and we put a "TARGET AND ARROW" Brand Tin Roofing over the Malthoid. We used the 14x20 inch Standing Seam Tin Roofing, just as we told you at the time the work was done.

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The Pacific Coast Architect

VOLUME VIII — SAN FRANCISCO, CALIFORNIA, AUGUST, 1914 — NUMBER 2

THE PACIFIC COAST ARCHITECT

J. A. DRUMMOND - - - - - - - Editor and Publisher

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Entered as Second-class matter at the Post-office at San Francisco.

Changes in, or copy for new advertisements must reach the office of publication not later than the Fifteenth of the month preceding issue.

The Editor will be pleased to consider contributions of interest to the readers of this publication. When payment for same is desired this fact should be stated. Self addressed envelopes must accompany all such contributions.

ADVERTISING RATES ON APPLICATION TEL. DOUGLAS 3424

EDITORIAL.

The Disaster at Salem, Mass.

The recent calamity at Salem recalls to the editor and no doubt thousands of others who have personally experienced the greatest of all fires in San Francisco, April 18, 19 and 20, 1906.

The time will come when laws will be arranged that responsibility in non-preparation to prevent fire hazards in building construction will be a "crime."

What is the comparison to adding a few paltry dollars in the original construction, obtaining a permanent fireproof building, compared with the total loss of the original investment, perhaps including great loss of life and adjoining property losses.

The greatest food for flames today is wooden shingles. At a recent fire in San Francisco on Polk street, on account of the high winds, the fire brands were carried from five to eight blocks away, falling as live embers.

The New York World of July 6th, 1914, has the following to say:

"SHINGLES TO BLAME"

"Massachusetts is still bending a thoughtful brow over the ruins of Salem. Everybody agrees that the one thing which contributed most to the spread of the fire was—shingles. House after house burst into flame the instant the rain of sparks touched the tinder-like shingle roofs. Tin or tile would have resisted long enough to give the fire fighters a chance and might have saved much of the town.

"In well-wooded New England, as in many other parts of the country, shingles have always been the handiest, cheapest thatch—so readily obtained, so easily put on, that many a thrifty farmer has found himself enough of a carpenter to shingle his own buildings.

"Nevertheless—a dry, weathered shingle makes about the finest kindling known. In a closely populated town a brisk wind carries flames over shingle roofs as fire sweeps over sun-burnt prairie grass.

"The Bay State is using the Salem fire to start a strong argument against shingles. **It will do the rest of the country no harm to listen.**"

The Pacific Coast being the largest producing section of wooden shingles, and a home market of lumber, etc., we already have too many fire traps. New laws are required, and to be rigidly enforced. As a great percentage of fire loss can be prevented, and we include the extracts of the annual report of Fire Commissioner Charles H. Cole of Boston, Mass., for the fiscal year just closed. Mr. Cole points out that 80 per cent of the $3,105,000.00 fire loss in that city last year was preventable. He refers to two causes of the preventable fire loss—lack of enforcement of the existing laws, owing to an unscientific scattering of authority through different boards and the inadequacy of the laws with respect to the material, construction and occupancy of buildings. He advises the centralization of all authority with respect to danger from fire under one department created for this purpose only, and improvement in the laws dealing with construction, alteration and maintenance of buildings. He would permit the fining of the owners of buildings in which fires occur, owing to defective chimneys and the punishment of persons who allowed fires to originate through carelessness as guilty of misdemeanor.

One of his recommendations is a special zone in the business district in which only construction of the first class should be allowed. Other suggestions are that no more **wooden roofs or wooden coverings on roofs** be allowed; that all buildings of five or more stories be of fireproof construction; that no building of any kind be nearer than ten feet to another, unless all openings in the walls are suitably protected, and that no part of any third-class building be nearer than twelve feet to the nearest part of another third-class building.

✧ ✧ ✧

The Reliable Time-Tried Building Material

The struggle to obtain better and cheaper building materials has brought upon the market many forms and kinds of construction. But when we look about for reliable building structures, we find the owner adapting brick and steel to his use. These materials long ago passed the experimental stage and today stand supreme as materials for tall buildings. Properly handled they stand the exacting tests of modern work and exhibit a definite class of superiority. The strength of the steel is the highest of all practical materials and the record resistance to fire and weather is positively held by brick. Nothing so far has been made by man to equal these materials in the respective qualities above written of.

Department of Liberal Arts, P.-P. I. E.

The editor of "The Pacific Coast Architect" is in receipt of a letter from Mr. Theodore Hardee, Chief of Liberal Arts at the Panama-Pacific International Exposition, which has been addressed to each chapter of the American Institute of Architects, the Architectural Leagues of America and the Pacific Coast, also Architectural Clubs in the leading cities of the United States. Architects desiring to participate should communicate with the department at once; the letter is as follows, dated July 15, 1914:

"Under the Official Classification of Exhibits at this Exposition all drawings, models and photographs of completed buildings, artistic architectural details, landscape architecture and architectural engineering will form exhibit groups in the Department of Liberal Arts, which must be displayed in the Palace of Liberal Arts.

"This Department comprises fifteen groups, covering the applied sciences, in which the exhibits will be notably interesting and significant. As the advances in Architecture and Architectural Engineering have exercised a potent influence upon the improvement of conditions in economic life and the cultivation of artistic taste, the exhibits portraying this progress in the United States should be especially complete and characteristic to uphold the prestige of American ideals and effort as compared with the displays of foreign countries in the Palace of Liberal Arts.

"The opening of the Panama Canal means the inauguration of a new and prosperous era by reason of the development of new avenues of commerce, and the Universal Exposition at San Francisco in 1915 will afford a rare opportunity to display the ideas and skill of American architects to the best possible advantage. The keen interest manifested by both American exhibitors and foreign governments assures an Exposition of the most representative international character. Thirty-six foreign countries have already accepted the invitation of the President of the United States to participate, and forty-two States have likewise signified their intention to take part.

"We should be glad to know without delay whether you wish to exhibit. All exhibits must of necessity be selective in character because of the comparative limitation of space which, by reason of wider participation and the world's more extended productivity, will be more restricted than at previous International Expositions. This will emphasize the advisability of applying immediately for exhibit space.

"While there is no charge for space, exhibitors are required to erect suitable booths and likewise defray the cost of transporting, installing and maintaining their own exhibits. As the exhibit buildings are now completed and ready for occupancy, the allotment of space will commence at an early date.

"All Chapters of the American Institute of Architects, as well as the Architectural Leagues of America and the Pacific Coast, and the Architectural Clubs in leading cities of the United States, have been invited to exhibit and to post a copy of this communication in their headquarters, or otherwise convey our invitation to their members to make exhibits, individually or collectively, at this Exposition. Blank applications for space, and other information prepared for the guidance of exhibitors, will be promptly forwarded upon request.

"I would appreciate the courtesy of a prompt acknowledgment of this communication, in order that I may gain some knowledge of your intentions and make due provision for your requirements if you should decide to exhibit.

"Hoping to be favored with an early reply, and assuring you of my heartiest co-operation, I am

"Very truly yours,

"THEODORE HARDEE,

"Chief of Liberal Arts."

Institute Offers Aid

President Wilson has been offered the active co-operation of the American Institute of Architects in the development of Washington, and for the betterment of housing conditions among those of limited means in the cities throughout the United States. This offer, says a Washington dispatch, has been referred by the President to the District of Columbia Commissioners, who are now considering to what extent and how this association can best aid in the upbuilding and beautification of the national capital.

The proposition for co-operation as conveyed by the board of directors to the President was that the board of directors of the American Institute of Architects realizes the importance and necessity of making proper provision in every city for the safe, sanitary and convenient housing of its inhabitants, particularly to those who contribute the fruits of their labor to the upbuilding of the community, and stated its belief that architecture should relate itself to the humblest human habitation as well as to all other buildings in a city. It requested the committee on town planning to urge, through its subcommittees in every locality that the architects of this country devote their earnest thought to improving the type, design and arrangement of the small and medium sized houses in all cities and suburbs and to bringing about, as far as possible, an improvement in existing conditions.

With reference, specifically, to the city of Washington, the board, "with a high sense of appreciation for what has been done toward preserving the original L'Enfant plan," expressed the hope "that equal attention will be given to the before-mentioned conditions of housing, and, desiring to co-operate with the officials in charge of the development of the nation's capital, offers to appoint a committee of five members of the institute to be known as the 'committee on the plan of Washington,' and authorizes such a committee to offer freely the aid and influence of the American Institute of Architects in all matters connected with the physical and artistic development of that city."

Commissioner Siddons has already called attention to the necessity for giving increased attention to the housing of the people in this city, and President and Mrs. Wilson are known to be deeply interested.

With the development of the commission form of government and city planning commissions in the younger cities of the country, many of them have attained considerable fame, it is said, not only as healthful residential cities, but as practical, well planned and attractive cities.

Another Conviction of an Illegal Practitioner

On evidence presented by the California State Board of Architecture N. D., Edward F. Helms was, on July 9th, convicted before Judge Shortall of practicing architecture without a license, and was sentenced to pay a $5000 fine or fifty days in the county jail

Architect Wins Suit

The case of Randall M. Wedgewood, architect, against Robert A. Jorgens, both of Grand Rapids, Mich., which has invited the direct interest of every architect in that city, was closed when a jury in Judge Perkin's court at Grand Rapids brought in a verdict awarding judgment of $170 for the plaintiff.

The case grew out of a transaction in which Wedgewood furnished plans for a building which was not erected. Payment of the account, $200, was refused, and the defense in court endeavored to show that the claim was not a valid one, because the plaintiff had not complied with the city ordinance requiring architects to take out a license and to pay an annual fee.

The interest of every architect in the city was aroused, as it is said that the ordinance has not been enforced and that license fees had not been paid as provided. Had the court determined that Wedgewood's claim was invalid because no license fee had been paid other architects of the city would stand a chance to be heavy losers if advantage should be taken of the decision.

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Some Defects in Building Construction

By Nathaniel Ellery, C. E.

When a building is completed and ready for occupancy, it stands out attractively on its new appearance. Frequently, behind the exterior of this new and bright structure, there is hidden some defect of construction of which the owner is unaware. The tendency to slight work, whenever the price received for doing the construction is low or slightly above cost, furnishes the reason for much defective work.

Trimming or shaving the contract price of a building by the process of dicker or grinding competition from the owner's standpoint is surely unwise, as no one can or intends, if he knows it, work at a loss to himself. As surely as this is done as surely must be provided the closest inspection or else we must expect some defective work, perhaps cleverly concealed, but there just the same. The old saying "you get what you pay for" is most applicable in erecting buildings. Honest workmanship and honest materials are the demands necessary to obtain a good building and honest contracting methods are essential to gain this end.

Again, too rigid care and inspection cannot be given a building of our present day for so many items in building materials are not thoroughly tested by time and use so that frequently an owner is placed in a positive quandary as to a selection. For illustration, take the instance of waterproofing a modern structure. There are so many preparations for such on the market as to bewilder even the technical man. To you who have experienced the management of the erection of a building, undoubtedly many close decisions concerning materials, layouts, or methods, have been made and your structure is the result of them.

To properly decide these points, it is necessary to investigate and examine thoroughly every one of them and to carefully note what has been done along the different lines. This is no small task. We know brickwork has been used for centuries in buildings, and we know good brickwork has stood the test of time. It requires good brick, good mortar, good workmanship to make a proper job. We must demand a good mortar for a permanent construction, preferably cement tempered with lime for ease of working. Lime mortar should only be used in the lower class of structures. We know it requires the air to cure the lime mortar, but cement mortar will set up in either water or air. Neither mortar is good unless your brick is thoroughly wet with water so that the mortar waters are not absorbed immediately, leaving a mortar unfit for bonding brickwork. Your brick should be tested for strength, and all bricks falling below a certain standard of test rejected. In workmanship all bonds or joints between bricks should be thoroughly filled with mortar, otherwise the strength of the work fails to develop just as much as the joints are unfilled. If you will demand good brick, good cement mortar and workmanship that will properly wet the brick and fill the joints, you will get a construction as solid as rock with strength unsurpassed by any other material and fire resistance and damp resistance of the highest order—unequaled by any material now used in practice.

Put up brick work, joints unfilled, poor mortar, poor brick and surely the work does not measure up to any where near good construction. Mr. Owner, demand hard brick, mortar of high cement content and good workmanship.

As I now understand, it is a rule of the bricklayers of San Francisco to demand all brickwork be "rubbed up," i. e. the joints filled. This is an excellent proposal and should receive full support and commendation. How often have we seen poor brick work, the cement in the mortar largely left out and not enough attention given the brick as to its strength and weather resisting qualities, and then the brick veritably thrown into the wall. Soft brick in exterior walls should not be tolerated, as it weathers in time and absorbs too much water. It has splendid fire-resisting qualities but should be limited to such work, or as interior fillers in heavy walls or construction. Dehydrated cement mortar or burned lime mortar between the facing bricks of a wall may be readily raked out and the work satisfactorily repointed or filled.

There seems to be the idea prevalent, that no inspection is required on brickwork, but far from it. There should be rigid watchfulness on the work in order to get results. To be sure the value of brick work may be quite easily determined, but it should not be constructed without inspection. It pays in better work. Personally I have seen two jobs under the same specification—one under good inspection; the other not. After completion, an examination disclosed the fact that one was excellently done, while the other was mediocre in execution and the mortar lacked a great part of its specified value. From brickwork let us review what has been done in concrete building construction and get at, if possible, some of the remedies for its extensive defects and call to attention much defective work in this material.

Reinforced concrete used as a structural material has many uncertainties as to strength value. A chemical material such as it, deposited behind wooden forms, hidden from view during the hardening period, cannot be inspected during this time, therefore the inspection as to the mixture and the ingredients should be of the highest order. Look at the concrete building immediately after stripping of the forms and note the condition of the material. Surely the defects of workmanship show in pour lines where the concrete has but little strength, rock pockets of inferior strength, unequal density of material giving weak and strong places, columns with horizontal seams of little adhesive

strength and nearly always the metal of reinforcement out of place as calculated. The liability of too much water in the mixture, the liability of too much sand in the mixture, or too little cement or bad sand or bad aggregate, all contribute to a finished material of inferior grade. Workmanship plays an important part in the making of concrete and yet but little attention is given this point. I have seen fine sand used, richly mixed with cement and allowed to dry out rapidly in sunshine and wind, when upon examination, it crumbled between one's fingers. All this demands inspection and should one of the many items constituting the mix be neglected you lose the value of the cement. Concrete needs a dense rich mixture for resistance to water and to dehydration by heat, but such mixture shrinks more than one of less cement and consequently tends to crack more. When a concrete wall becomes checked, as many of such walls in San Francisco are, the owner is confronted with the problem of painting such surface every year or two for protection from storms and with only partial results. Better had he placed more metal reinforcement at a greater first cost than be under such a maintenance expense. Mr. Owner, in concrete work you had better buy the best materials, inspection and workmanship if you expect to realize anywhere nearly your anticipation of a good structure.

The engineer's dream of a monolithic building of reinforced concrete strikes wide of the mark of fulfillment. The present methods of handling the material with the flaws likely to occur from other sources, assuredly demands the owner be on the alert. Personally, I have dug away the concrete material in columns for two-thirds of the horizontal surface and replaced the material. This is not the best of construction, but is the best under such circumstances. Look at the vast difference between concrete cured rapidly in air and that allowed to cure slowly to get its full strength. The one is unsound with partial strength, while the other is hard and set firmly. Strict attention should be given this point. If we were to leave the forms on longer and keep damp these forms, long retaining the moisture, much better results may be realized.

Leaving out cement and using poor sand are perhaps two of the greatest causes of defects in concrete work. Too much water spoils the mix and the deposit of different batches of concrete that comes from the mixer show plainly at the finish. Of necessity we break the concrete building at or near the floor lines, and thus create defects in construction as yet not practical of avoiding.

Usually when cement exterior plastering is done the mixture is too rich in cement and therefore cracks and becomes unsightly. Use a lean mixture and avoid much of this inherent trouble. On concrete structures, the tendency now is not to plaster but spade the coarse particles in the concrete back from the surface and use surfaced form lumber, thus creating a smooth surface of the finer materials which are solidly a part of the body of the concrete.

In the fireproofing of steel frames with concrete, much poor concrete may be seen. All porous places practically have no fire resistance and therefore a very small value in this position. Again, if you will take the time to personally investigate and note the closeness of the reinforcing metal to the surface of the concrete, especially the underside of floor slabs, one cannot but be impressed with this defective feature.

It has been the desire of the writer to call attention to some of the defects in present building practice and offer some guidance to avoid them in the future.

Architectural Features at the P.-P. I. E.

By Waldemar H. F. N. de Bille.

Imagination is the keynote of the architectural scheme of the Panama-Pacific International Exposition and each of the marvelous dream-palaces and wonderful courts represents a master-piece of the designing architect. Like an enchanted city the Exposition has arisen from the shores of the beautiful Bay of San Francisco, and towers and minarets and domes of ten completed exhibit buildings cast their intermingling shadows in the reflecting waves.

In direct contrast to former expositions the architecture of the Panama-Pacific is not wholly in one rigid and inflexible style, but displays the various types which have won renown in many eras in many different countries.

Unhampered by the limitations of inviolable convention, the architects have given free rein to their imagination and many of the buildings and courts represent the realization of dreams which few of the designers had hoped ever to see actually constructed. There has never lived an architect who has not mentally seen visions of palaces which expressed his ambition. The understanding of this imaginative side of architects on the part of the Exposition executives has caused the construction of an exposition such as the world has never seen. In the architectural scheme of the Exposition there is a touch of the mysticism of the Orient, the realism of the Hellenic period, the beauty of the old Spanish school, the luxuriousness and abandon of the Italian, and the massive solidity of the Gothic.

In the "Walled City" a group of eight exhibit palaces—the buildings were designed by the Exposition's engineers and an architect was commissioned to prepare the plans for the exterior walls, while the interior walls were designed by the architects of the various courts.

The site of the Exposition consists of a 635-acre strip of land extending for almost three miles along the shores of the Bay of San Francisco, its western end being within a stone's throw of the Golden Gate. The grounds have been divided into three parts; the western one containing athletic and aviation fields, international military camping grounds, drill-grounds and state and foreign pavilion sites. On the east is the Zone, the concessions district, with its hundred or more amusement features which will cost $10,000,000.00 to construct. Many of these are practically completed.

In the center is the exhibit buildings space, which with the exception of the Palace of Fine Arts is completed. The main group of the exhibit palaces, eight in number, is known as the "Walled City" and includes the Palaces of Varied Industries, Mines and Metallurgy, Agriculture, Liberal Arts, Transportation, Manufactures, Food Products and Education. As the buildings are all of the same height and identical in placement of domes and the courts between are spanned by huge arches which join the palaces together, the appearance of a huge structure under one roof is given, and hence the name "Walled City."

The central court is known as the Court of the Universe and in this are the magnificent sunken gardens capable of seating 10,000 people. Designed by Messrs. McKim, Mead and White of New York, the court

presents many beautiful features. The two great arches, one at the western entrance—the Arch of the Setting Sun—and the other at the eastern—the Arch of the Rising Sun—are perhaps, the most striking of these. Each is surmounted by a massive group of statuary, 42 feet high, one entitled "The Nations of the East," and the other "The Nations of the West."

The Court is 900 feet by 500 feet and resembles in shape the great plaza approaching St. Peter's. On the south the court is entered through an archway under the huge Tower of Jewels, 435 feet high, topped by a sphere 17 feet in diameter. The tower is of all steel construction and will on hot days be four inches higher than on cool days. The shaft is pyramidical in shape and covered with rich carvings and pieces of sculpture. The base is 125 feet high and it is through this that the vaulted archway has been constructed. The general details of the court are of the Italian Renaissance with a suggestion of the Byzantine influence, while the idea of the east and west arches was inspired by the triumphal arches of Imperial Rome.

The most beautiful of the courts is the Court of Abundance, designed by Louis C. Mullgardt of San Francisco. In no other specimen of architecture at the Exposition has imagination played the part that it has in this court. Spectacular to the extreme the details and general ensemble will hold the visitors spell-bound with admiration at the daring of the conception and the masterly manner of execution.

The Court of the Four Seasons in the western half of the "Walled City," designed by Henry Bacon of New York, was recently completed. There are some exceptionally fine specimens of sculpture in that court. It is believed that Hadrian's Villa was the source of Mr. Bacon's inspiration.

By the use of the excellent imitation of Travertine marble, invented by Paul Denivelle, for the treatment of all the exteriors of the Exposition, the suggestion of stucco or plaster is eliminated and the impression given of a dream city of palaces constructed of rare marble, soft in tint and tone.

Notes of contrast to the beautiful soft tones of the marble are gained by the integral castings of columns in what appears to be red sienna or Numidian marble, or a verde antique in bronze or gold. The stratified texture of the Travertine is reproduced even in these.

The designers of the Palace of Machinery, one of the largest wooden buildings ever constructed, was influenced by the Roman baths and thermae. The composition is essentially Roman and the decoration while classic in design is suggestive of modern machinery and invention. The principal architectural features are the three central longitudinal bays and three transverse bays crossing at the center of the building. On either side of the longitudinal naves is a secondary bay. The building is 967 feet long, 367 feet wide and 136 feet high.

The Palace of Fine Arts, which is not yet quite completed, is curved in plan with its east and west elevations forming ares. The building is 950 feet long and 135 feet wide.

It is situated about 400 feet from the west wall of the walled city and the wings half-encompass an immense pool of still water which will reflect the architectural beauty of the building. As this building will house valuable art treasures it was necessary to construct it in a fireproof manner. The construction consists of a steel frame supporting the roof of skylights and thin concrete slabs with walls of cement plaster two and one-half inches thick. The exterior walls are finished in the Travertine marble. The building cost approximately $600,000.

The Palace of Horticulture will appeal to the artistic sense more, perhaps than any of the other creations on the grounds. The composition is Saracenic and similar in relation to the arrangement of its dome and minarets, to the Mosque of Sultan Ahmed I. In detail and ornamentation the suggestion is of the seventeenth century French Renaissance and the wooden trellis work is derived from the architecture of the Louis XIV period in France. The immense dome, 185½ feet high and 152 feet in diameter, is the dominant feature and is covered entirely with glass.

The Festival Hall, now being constructed, has the usual theater arrangement of a foyer in front and the stage behind a circular auditorium. As most of the theatrical features of the Exposition will be staged in this building, especial attention has been paid to the acoustic properties. The plan of the building was evidently derived from a study of the Theatre des Beaux Arts type of French architecture and has handled it in an exceptionally successful manner.

Progress at the P.-P. I. E.

By Hamilton Wright.

Nine huge exhibit palaces have been completed at the Panama-Pacific International Exposition at San Francisco. Altogether there will be thirteen main structures on the Exposition grounds, and an auditorium to seat 12,000 persons and to cost more than $1,300,000, is under construction at the Civic Center of the city.

The result of the work fulfills every expectation of the commission of famous architects to whom was entrusted the Exposition design. To blend into and fit in with the impressive natural surroundings of the site at Harbor View, the great hills that encircle the grounds on the south, east and west, the harbor on the north, with its islands, and beyond the Golden Gate, it was planned to produce a single superb architectural design and the plan has been carried out.

The Exposition grounds which face the harbor for almost three miles are occupied by three great groups of buildings. In the center are the exhibit palaces; upon the east is the amusement section, and on the west and nearest the Golden Gate is the section devoted to the pavilions of the thirty-six nations that are to take part and of the states.

From the heights of Belvedere, four miles across San Francisco harbor, the vast copper-green domes of the main palaces are seen to reach more than half way to the first rims of the great encircling hills at Harbor View. Glints of gold and jade and sapphire are splashed over the buildings in brilliant, riotous colors that, in the distance, melt together in a vast mosaic.

In the center group eight of the exhibit palaces are joined in a rectangle. Four of the buildings face upon a 400 feet wide esplanade upon San Francisco harbor and four face the South Gardens between the main group of buildings and the Exposition boundaries. The four buildings facing the harbor from east to west are the palaces of Mines and Metallurgy, Transportation, Agriculture and Food Products. To the south, completing the group, are the palaces of Varied Industries, Manufactures, Liberal Arts and Education. The buildings are identical in height. Their architecture as seen from afar is also similar and it is only when one gets close at hand and within the courts that the divergencies are apparent.

The dimensions and costs of the eight buildings are:

Palace.	Size Linear Ft.	Area Square Ft	Cost
Mines and Metallurgy	451 x 579	252,000	$359,445
Transportation	579 x 614	314,000	481,677
Agriculture	579 x 639	328,633	425,610
Food Products	424 x 579	236,600	342,551
Varied Industries	414 x 541	219,000	312,691
Manufactures	475 x 552	234,000	341,079
Liberal Arts	475 x 585	251,500	344,180
Education	394 x 526	205,100	425,610

Flanking this group of eight structures upon the east is the Palace of Machinery, costing more than $600,000. This was the first of the Exposition palaces to be completed. Its interior arrangements consists of three north and south aisles each 130 feet in height and 76 feet in width, extending the entire length of the building, 967.8 feet. Three transverse aisles, each 126 feet long and 75 feet wide, run east and west through the center, intersecting the north and south aisles.

Flanking the group upon the west is the Palace of Fine Arts, which is separated from the groups by a lagoon which it partly envelops and which is bordered by flowers, shrubbery and trees, giving the effect of a forest lake in the tropics fringed with rich shrubbery and palms. The building describes an arc 950 feet in length and its area is 205,000 feet or nearly five acres. The Palace of Fine Arts is of steel and concrete and is fire and burglar proof.

Opposite the Palace of Education, in the South Gardens, is the great Palace of Horticulture. This huge structure covers approximately five acres and in architecture is Saracenic. Its most prominent feature is a steel dome 186 feet in height and 152 feet in diameter, covered with wire netting glass. The dome is surmounted by a half-globe, "the flower-basket," 26 feet in height and weighing twenty-eight tons. During the Exposition the half-globe will be planted with flowers of all kinds. At night the dome will become one of the most spectacular features of the Exposition. Kaleidoscopic lights from within will play upon the glass, giving the giant sphere the effect of a huge iridescent soap bubble. South of the Palace of Varied Industries and also in the South Gardens Festival Hall, a rendezvous for conventions in 1915, is under construction.

The eight exhibit palaces forming the rectangle are divided by three avenues running north and south and one east and west. At the intersection of the east and west avenue with the north and south avenues lie three great courts of honor, the walls of the four buildings surrounding each court being indented to form the oval of the court. In the center of the group is the great Court of the Universe; on the west, paralleling the Court of the Universe, is the Court of the Four Seasons and on the east is the Court of Abundance. Vast colonnades encircle the courts, running from their openings on San Francisco harbor back to the courts themselves. From almost any point of view, the visitor while traversing the courts will gain flashing glimpses of the blue harbor between the lofty colonnades.

The Court of the Universe is 750 feet in width by 900 feet long and resembles somewhat in shape the great plaza approaching the Church of St. Peter at Rome. The effect of the court is magnificent. Corinthian columns encircle it. The walls of the palaces behind the columns are colored a burnt sienna, while the vaults of the corridors are ultramarine blue. The columns are the shade of the exhibit palaces, a faint ivory yellow, the color of imitation Travertine stone. The columns of the Court of the Four Seasons are Roman Ionic, modified with a touch of modern detail. This court is 340 feet square and opens to the north on San Francisco harbor by a colonnaded avenue 473 feet long and 173 feet in width. Through a passage in a great niche or half-dome at the south end of the court it opens into the Court of Palms.

The east court or Court of Abundance is similar in size and shape to the Court of the Four Seasons. An arcade, dominated by a great Oriental tower, 270 feet in height, upon the north avenue of the court, encircles the court. Between the courts along the intersecting east and west avenues are great open patios, where the ornamentation of the walls of the palaces is very lavish. The patios are cut off from the courts by huge colonnades, so that each presents a distinctive scheme of color and decoration. The prevailing decoration of these vast open aisles is Pompeiian with shades of green and terra cotta, or robin's egg blue and Venetian red blending in marvelous mosaics.

(Continued on page 70)

Clift Hotel

Work of finishing the imposing Clift Hotel, at the southeast corner of Geary and Taylor streets, the steel frame of which was completed some time ago, has started. The magnificent new hostelry will soon be ready for occupancy. It will be one of the most richly finished and furnished hotels in this country. Revival of business and betterment of conditions generally is displayed strikingly in the fact that work of completing it has been taken up. The building will be ready for occupancy by the time the fair opens. Geo. A. Applegarth is the architect and the Clift Realty Co. are the owners.

The construction is Class "A" and the building has one of the strongest steel frames in San Francisco. The style of the exterior will be of Italian Renaissance, and materials of construction will be terra cotta and light cream brick, with bronze for the marquee and entrance doors.

The first floor will contain a spacious lobby, with the main entrance on Geary street. Adjoining the lobby is the office, and the main dining-room, breakfast-room and children's dining-room. The finish of the main lobby will be in Tavernelle marble, carved caen stone for the walls and columns, and the floor of inlaid marble.

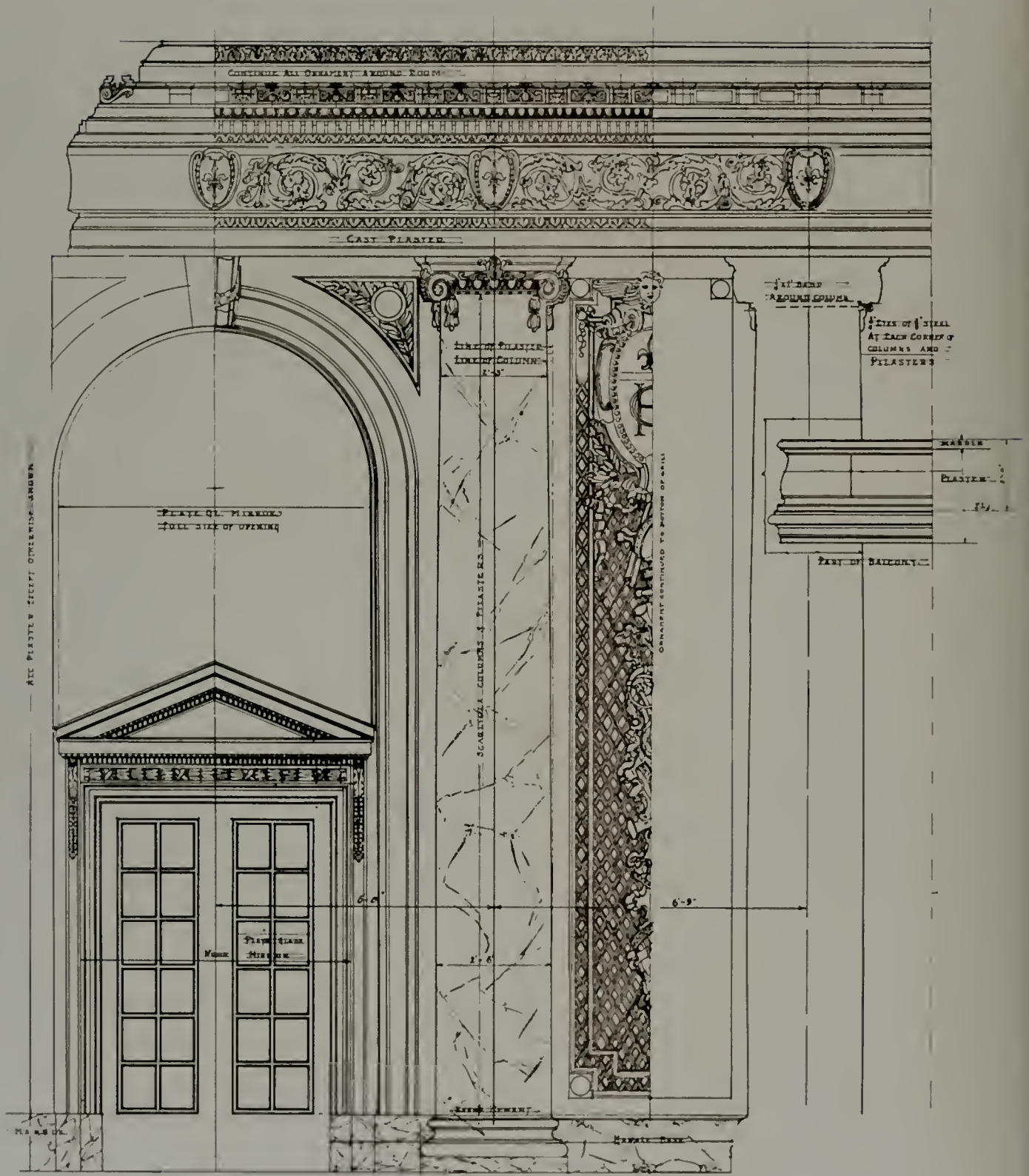
The beamed ceiling will be richly decorated in old gold and subdued colors. At the easterly end will be a large fireplace, with a mantel of carved stone and marble. The main dining-room will have Tavernelle marble columns and pilasters, and the walls and ceiling decorated in a general tone of old ivory, with a suggestion of color in the ornamental features.

The buffet, which is entered from Geary street, will have the walls of quartered oak paneling, a richly ornamented ceiling and the floor of tile and marble.

The banquet rooms will be on the mezzanine floor. From the second to the twelfth stories are the guests' rooms, which are arranged in suites with spacious parlors. The bedrooms will have commodious and well-equipped dressing closets, and the baths will have the most modern fixtures and tiled floors and walls.

The elevators will have safety appliances of such design as to absolutely preclude the possibility of accidents. Every modern feature for the comfort and convenience of the guests has been incorporated in the building, and will place it on a par with the leading hotels of the East.

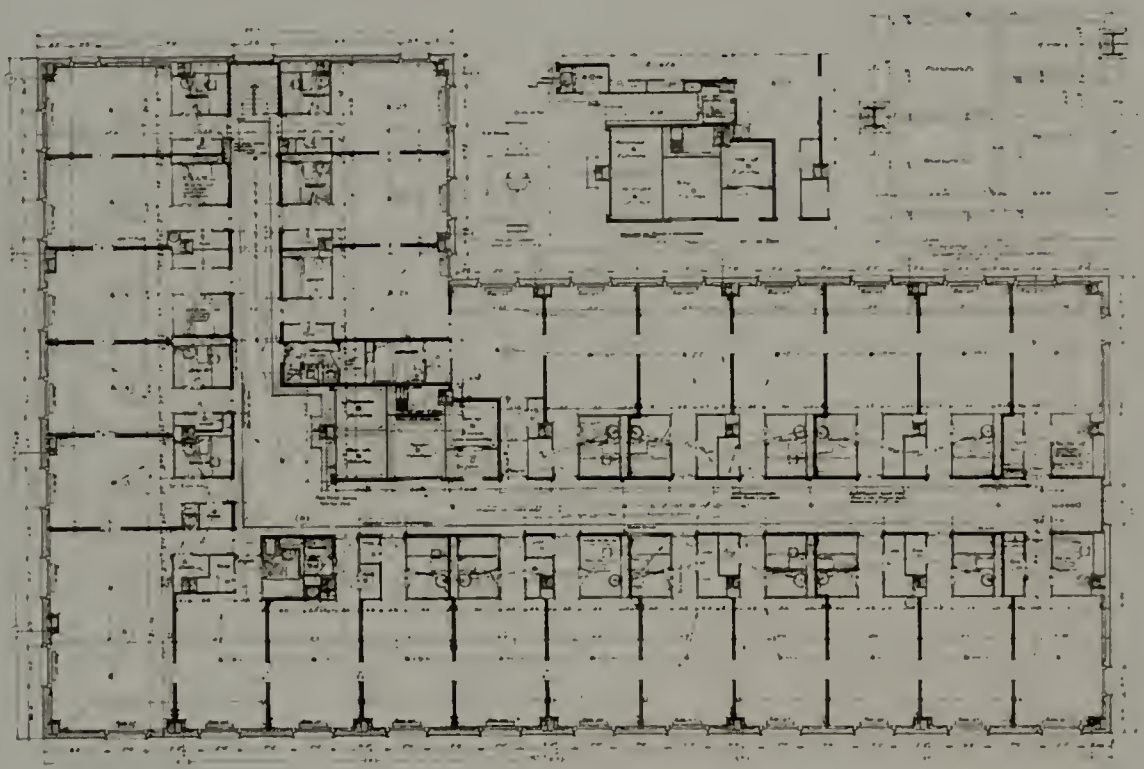
Clift Hotel. Owner, Clift Realty Co.
Geo. A. Applegarth, Architect, San Francisco



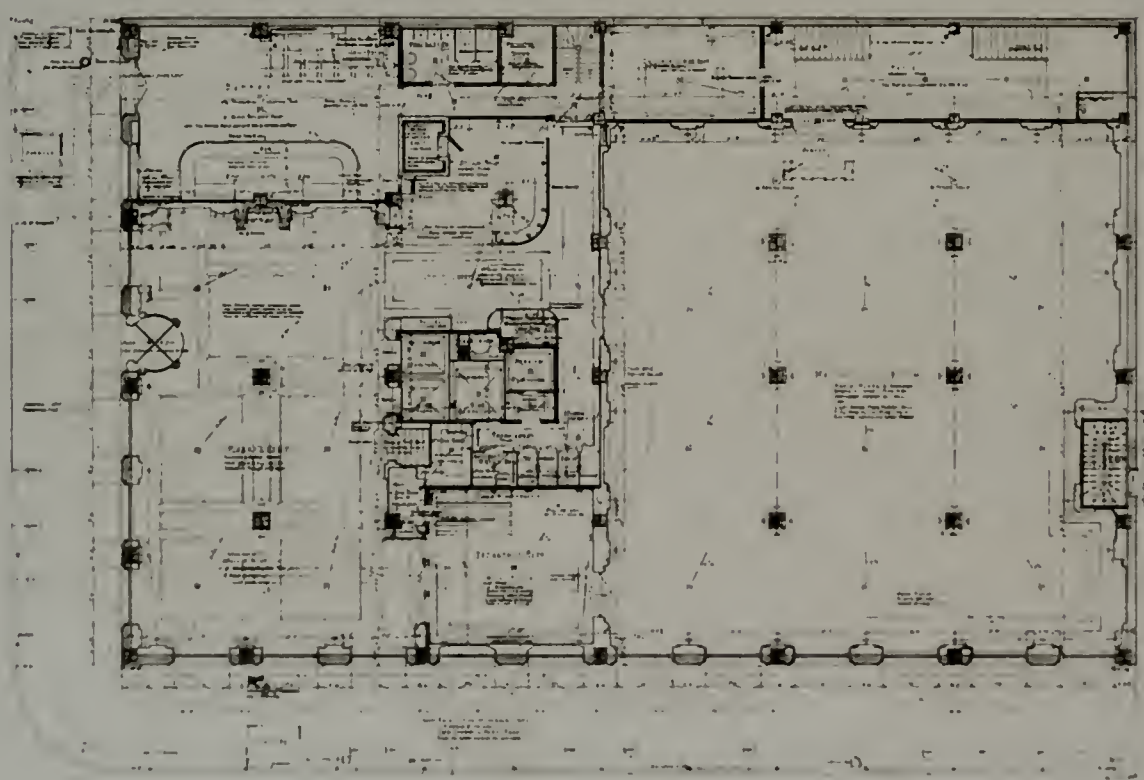
Scale ¼" to the 1'-0"

Detail of Dining Room, Clift Hotel
Geo. A. Applegarth, Architect, San Francisco

Detail, Twelfth Story, Clift Hotel
Geo. A. Applegarth, Architect, San Francisco



Typical Floor Plan, Clift Hotel



First Floor Plan, Clift Hotel
Geo. A. Applegarth, Architect, San Francisco

Palace of Horticulture, P. P. I. E.
Bakewell & Brown, Architects, San Francisco

Colonnade of Court of Four Seasons, Palace of Agriculture, P P I E
Henry Bacon, Architect, New York City

Palace of Education, P.-P. I. E.
Bliss & Faville, Architects, San Francisco

Small Doorway, Varied Industries, P. P. I. E.
Bliss & Faville, Architects, San Francisco

Small Doorway, Palace of Education, P.-P. I. E.
Bliss & Faville, Architects, San Francisco

Palace of Mines, P.-P. I. E.

Bliss & Faville, Architects, San Francisco

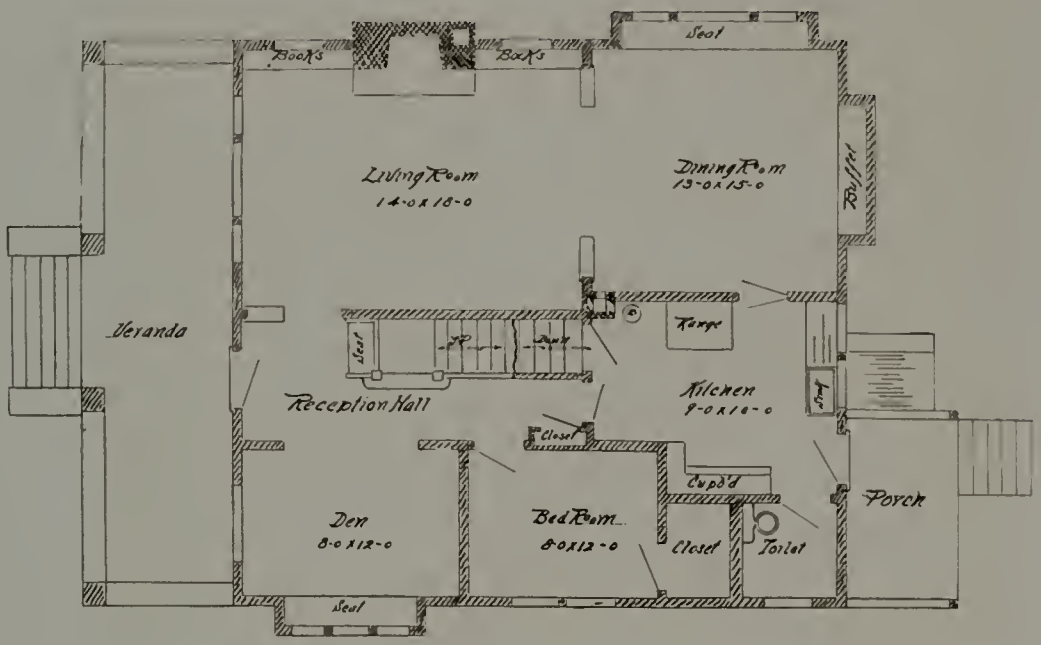
Palace of Machinery, P.-P. I. E.
Ward & Blohme, Architects, San Francisco

Vestibule, Palace of Machinery, P. P. I. E.
Ward & Blohme, Architects, San Francisco

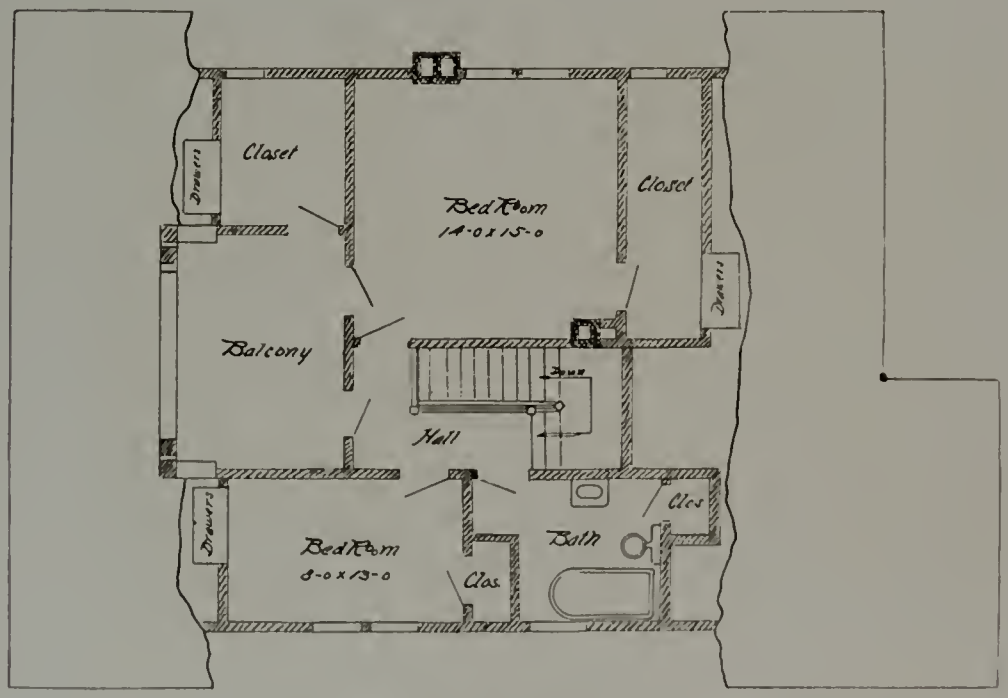
Palace of Food Products, P.-P. I. E.

Bliss & Faville, Architects, San Francisco

Residence of M. L. Pershall, Spokane, Washington
Mr. W. J. Ballard, Architect



First Floor Plan



Second Floor Plan

Floor Plans—Residence of M. L. Pershall, Spokane, Washington
Mr. W. J. Ba[illegible], Architect

Dining Room—Residence of M. L. Pershall, Spokane, Washington
Mr. W. J. Ballard, Architect

Living Room—Residence of M. L. Pershall, Spokane, Washington
Mr. W. J. Ballard, Architect

Residence, T. H. and F. Davis, Cliff Drive, Santa Cruz, Cal.
Architect, Chester H. Miller, Oakland, Cal.

Second Floor Plan

First Floor Plan

Residence T. H. and F. Davis
Chester H. Miller, Architect

"THE PACIFIC COAST ARCHITECT" is the official organ of the San Francisco Chapter of the American Institute of Architects.

San Francisco Chapter, 1881—President, G. B. McDougall, Russ Building, San Francisco, Cal. Secretary, Sylvain Schnaittacher, First National Bank Building, San Francisco, Cal.
Chairman of Committee on Public Information, William Mooser, Nevada Bank Building.
Chairman of Committee on Competition, Geo. B. McDougall, 235 Montgomery St.
Date of Meetings, third Thursday of every month; annual, October.

OTHER PACIFIC COAST CHAPTERS OF THE AMERICAN INSTITUTE OF ARCHITECTS.

Southern California Chapter, 1894—Vice-President, A. C. Martin, 430 Higgins Bldg., Los Angeles, Cal. Secretary, Fernand Parmentier, Byrne Building, Los Angeles, Cal.
Chairman of Committee on Information, W. C. Pennell, Wright & Callender Bldg., Los Angeles.
Date of Meetings, second Tuesday (except July and August), (Los Angeles).

Oregon Chapter, 1911—President, Morris H. Whitehouse, Wilcox Building, Portland, Ore.
Secretary, Ellis F. Lawrence, Chamber of Commerce Building, Portland, Ore.
Chairman of Committee on Public Information, Ellis F. Lawrence.
Date of Meetings, third Thursday of every month, (Portland); annual, October.

Washington State Chapter, 1894—President, James Stephen, 726 New York Block, Seattle, Wash. Secretary, Arthur L. Loveless, 513 Colman Building, Seattle.
Chairman of Committee on Public Information, Chas. H. Alden, 513 Colman Bldg., Seattle (till further notice send all communications to Arthur L. Loveless, 513 Colman Building, Seattle.)
Date of Meetings, first Wednesday (except July, August and September), (at Seattle except one in spring at Tacoma); annual, November.

Colorado Chapter, 1892—President, George H. Williamson, 528 Majestic Bldg., Denver, Colo. Secretary, Arthur A. Fisher, 459 Railway Exchange Building, Denver, Colo.
Chairman of Committee on Public Information, Arthur A. Fisher, 459 Railway Exchange Bldg., Denver, Colo.
Date of Meetings, first Monday of every month (Denver, Colo.); annual, September.

THE AMERICAN INSTITUTE OF ARCHITECTS.
The Octagon, Washington, D. C.

OFFICERS FOR 1914.

President ..... R. Clipston Sturgis, Boston, Mass.
First Vice-President ..... Thomas R. Kimbal, Omaha, Neb.
Second Vice-President ..... Frank C. Baldwin, Washington, D. C.
Secretary ..... D. Knickerbacker Boyd, Philadelphia, Pa.
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Walter Cook, New York, N. Y.

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Thomas J. D. Fuller, 806 Seventeenth St., Washington, D. C.
Robert Stead, 906 F Street, Washington, D. C.

SAN FRANCISCO CHAPTER, A. I. A.

Owing to the lack of a quorum, no meeting of the San Francisco Chapter of the American Institute of Architects was held on July 16, 1914.

SOUTHERN CALIFORNIA CHAPTER, A. I. A.

No minutes received from Southern California Chapter this month.

WASHINGTON STATE CHAPTER, A. I. A.

As the Washington State Chapter, A. I. A., does not hold meetings during the months of July, August and September, there will be no minutes of meetings published until October, when they will be resumed.

OREGON CHAPTER, A. I. A.

Meeting held at the Commercial Club June 18, 1914, called to order by President Whitehouse.

Wm. G. Holford appointed Secretary pro tem in absence of Secretary Lawrence.

Present: Messrs. Whitehouse, Lazarus, Tegen, Williams, Smith, Hogue, Allyn, Fouilhoux, Doyle, Mayer, Naramore and Holford.

Mr. Naramore moved and Mr. Mayer seconded that the minutes of the last meeting be accepted as printed. Motion carried.

REPORTS OF COMMITTEES.

Owing to the limited time, there were no reports from regular committees with the exception of that of Building Laws. Mr. Fouilhoux as chairman pointed out the necessity of a thorough investigation of the proposed Housing Code. After the discussion, Mr. Doyle moved that the Secretary send notices to all members of the Chapter asking them to send to Chairman Fouilhoux suggested modifications of the Housing Code on or before June 27th, as a report would have to be sent to the Council by the Chapter. The motion was duly seconded by Mr. Smith and carried.

Mr. Doyle moved that the Building Laws Committee call a special meeting for July 1st to consider this Housing Code, and that all members of the Chapter interested be invited to attend the committee meeting and that the Committee on Building Laws be empowered to act for the Chapter with approval of the Executive Committee. Motion seconded by Mr. Naramore and duly carried.

SPECIAL COMMITTEES

Mr. Lazarus, chairman Sub-Committee on Contracts and Specifications, reported and suggested that all members be notified where the Standard Documents of the Institute can be found, requesting them to submit to the committee any changes or suggestions of same.

READING OF COMMUNICATIONS.

Owing to the lack of time, the month's communications were referred to the Executive Committee for proper action.

Mr. Naramore moved that the meeting adjourn. Motion duly seconded by Mr. Doyle and carried.

ELLIS F. LAWRENCE,
Secretary.

Albert Pissis Is a Victim of Pneumonia

Death took one of San Francisco's best-known architects when Albert Pissis succumbed to an attack of pneumonia at the St. Francis Hotel. Pissis died after a comparatively short illness.

A history of San Francisco architecture would not be complete without mention of the name of Albert Pissis. Before the fire, as well as since, he had been actively engaged in his profession, designing some of the city's greatest edifices. These include the London Paris National Bank, Hibernia Bank, the Emporium, the White House, Mechanics' Institute building and the Jewish Synagogue, besides several crematories and mausoleums in local cemeteries. He also planned the Catholic Church at San Mateo and several buildings in Los Angeles, including the Callaghan, Alliance, Loft, Haas and Wilcox.

Pissis was one of the five architects selected as members of an advisory committee of the architecture procedure for the 1915 Exposition. He was an Associate of the American Institute of Architects and a past president of the San Francisco chapter. He belonged to the Pacific Union and Bohemian clubs and other organizations.

Born in Guaymas, Mexico, Pissis was brought to San Francisco by his parents when but a youth, receiving most of his education here. He studied architecture in the Ecole des Beaux Arts in Paris, and traveled extensively through Europe, studying his profession. He entered into active practice upon his return to San Francisco.

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Architect-Banker Called by Death

David B. Farquharson, for forty years president of the California Savings and Loan Society, and also one of San Francisco's best known architects, died recently at the home of his son, Charles D. Farquharson, 2205 Sacramento street. A complication of diseases incident to old age was the cause of death. He was 87 years old.

Born in Scotland, Farquharson came to this country as a young man and passed most of his life in San Francisco. He soon became proficient in architecture and established himself in that profession here soon after his arrival. He was a charter member of the Pacific Coast Archaeological Society, founded in 1862, which subsequently became the Pacific Coast Association of Architects, and later the San Francisco Chapter of the American Institute of Architects, and of which he was an honorary member.

Some of the largest and most beautiful of San Francisco's bank and office buildings were born in Farquharson's brain. The old Bank of California was one of his notable achievements, being considered a monument of refinement in design and detail. It was unfortunately destroyed in the fire of 1906. His career as a banker also made him prominent in business circles.

Progress at the P.-P. I. E.

(Continued from page 52)

The outside walls of the central group of eight palaces forms an almost continuous facade. Throughout its entire circuit of the group its surface is unbroken save by the huge and highly decorated portals and entrances to the exhibit palaces, by the openings of the courts upon San Francisco harbor and by the two minor courts that open out upon the South Gardens.

Throughout the circuit of the vast encircling facade there is regularity in the architecture. In the walls of the stately palaces are green latticed windows with a wealth of gold and terra cotta showing behind the network of the green. The windows recall those of the great monasteries. Indeed several of these are replicas of portals in famous Spanish monasteries. Repeated groups of statuary, lofty Corinthian and Ionic columns, stately portals and a profusion of ornamental trees, some of them fifty feet in height, and shrubs contrast with the prevailing ivory tint, the walls lending life and beauty to the ensemble.

And in this great shell, which is to house the exhibits of the world, will the world's progress be worthily exemplified. Italy, which has appropriated $400,000 toward the Exposition, was the last of the foreign nations to dedicate its site. Signor Ernesto Nathan, former mayor of Rome, who visited San Francisco as commissioner from Italy to the Exposition, promised that his country would make the finest display ever presented by Italy at a foreign exposition. "Argentina will make a representation unsurpassed among the nations," said His Excellency Romulo S. Naon, when the Argentine dedicated its site last fall. That Argentina's exhibit will be extensive may be inferred from the fact that the great South American republic has appropriated $1,300,000 gold for its participation. The exhibit will include a vast live stock display in the live stock pavilions and illustrative displays of Argentina's schools, churches, theatres and educational methods. Canada will make a huge exhibit of the agricultural resources of the Dominion. The great Canadian pavilion, to cost $300,000, is structurally completed and the finishing touches will be put on next fall. Canada appropriated $600,000. France will expend $500,000. The figures run high. Thomas G. Stallsmith, one of the Exposition commissioners to the Orient, has given out a list of the appropriations of the Oriental countries: China, $1,000,000; Philippine Islands, $600,000; Japan, $600,000; Australia, $400,000; Siam, $250,000; Dutch East India, $250,000; New Zealand, $200,000; Cochin China, $150,000.

Although Germany will not participate officially, more than fourteen hundred of the leading manufactures of Germany will be represented; $125,000 is devoted to an exhibit of a single manufacturing industry, that of Potash, and the construction of the potash building has begun. Six hundred of the leading industries of Great Britain will combine in a collective display, despite the final refusal of the government to participate. Here is a list of the participating nations: Argentine Republic, Australia, Austria, Bolivia, Brazil, Canada, China, Costa Rica, Cuba, Denmark, Dominican Republic, Ecuador, France, Guatemala, Haiti, Holland, Chile, Honduras, Italy, Japan, Siberia, Mexico, New Zealand, Nicaragua, Norway, Panama, Persia, Peru, Portugal, Salvador, Spain, Sweden, Turkey, Uruguay and Venezuela.

More than 230 great international congresses and conventions, at which more than 500,000 accredited delegates will assemble, have voted to meet in San Francisco in 1915. It is expected that fully 500 conventions will have decided to meet in San Francisco by the time the Exposition opens. The delegates to these assemblages will come from every part of the globe and leaders in art, science, industry and in the teaching of ethical propaganda, will present in standardized form the results of the world's best effort in recent years. A resume of the conventions that have voted to meet in San Francisco discloses the following activities: Agricultural societies, 25; business, 20; educational, 21; fraternal, 37; genealogical, 7; Greek letter fraternities, 23; governmental and civic, 16; historical and literary, 5; industrial, 15; labor, 9; professional, 15; religious, 9; scientific, 20; social service, 8.

One of the most interesting conventions will be the International Engineering Congress. The engineers of the Pacific Coast have already raised a large sum to finance the congress and the five great national engineering bodies comprising the congress have also guaranteed to aid in defraying the expenses of the meeting. An exhaustive discussion will be given to the construction of the Panama Canal, among the subjects, and the proceedings of the congress will be published in standardized form. Colonel George W. Goethals has been tendered and has accepted the chairmanship of the congress.

Among other important assemblages there will be an International Council of Nurses, to meet in San Francisco during the latter part of May next year. Five thousand nurses from fifteen nations are expected to participate in this gathering; delegates from more than twenty-five nations interested in grape culture will attend the International Congress of Viticulture, to be held in June, 1915, the leading electrical experts of the world will meet in the International Electrical Congress in September, while the World's Petroleum Congress, the first ever held, will meet in the fall of next year;

thirty-four American and three European organizations concerned with the marketing, production and distribution of petroleum will take part in this congress. The International Potato Congress, to deal with the production, distribution and marketing of the potato, will be one of the most unique conventions, as also will be that of the National Topnotch Farmers' Club, an organization of corn growers, with headquarters in Springfield, Ill.; the club consists of corn growers who have established a record in producing at least one hundred bushels of corn to the acre; the president of the organization is Mr. W. L. Dunson of Alexander City, Ala., who earned the presidency by growing 232.7 bushels of corn on an acre of ground. When the record is superceded, the grower raising the most corn on an acre will automatically become president.

Plans are under way to assist the delegates to conventions in gathering information in the specialized lines in which they are most interested. The American Breeders' Association, for example, has been invited to send a committee of its members to San Francisco in advance of the convention to list everything of greatest value at the Exposition dealing with the subject of cattle breeding. Pamphlets telling how and where to find these exhibits will be mailed to the members before they start for San Francisco. Indeed, in all conventions the exhibits will comprise useful auxiliaries to the reports and addresses upon various subjects.

History of the Largest Varnish Manufacturers

Among the lesser known commodities, but which, at the same time, play a conspicuous part in our every day life, varnish is a noted example.

While the beautifying effects of varnish are seen on every hand, and the lack of it would detract greatly from the aesthetic harmony of our surroundings, we are apt to accept varnished things as a matter of course, giving but small thought of varnish as a cause or as a commodity.

Among the greatest producers of varnish in the country is the house of Berry Brothers, located at Detroit, Mich., and which is said to be the largest manufacturing industry in the world.

This firm arose from the most humble origin, the business being established in 1858 by Joseph H. and Thomas Berry, on an extremely modest scale. The infant industry speedily grew into lusty manhood, however, and has kept on growing until the present mammoth factory is one of the show places of Detroit.

The fame of Berry Brothers has been very largely enhanced by their introduction of two great specialties that have attained world-wide popularity, viz.: "Luxeberry Wood Finish" or Hard Oil Finish, as it was originally called, this name being afterwards changed because the name was imitated so widely, and "Liquid Granite," a finish of remarkable toughness and elasticity, for floors and interior woodwork where the exposure is excessive.

The establishment of Berry Brothers consists of factories and offices at Detroit, San Francisco and Walkerville, Ont., the latter to take care of their large Canadian trade, and branch houses at New York, Boston, Philadelphia, Baltimore, Chicago, Cincinnati and St. Louis. It also includes warehouses at Kansas City, Denver, Chattanooga, Dallas, Toronto, Winnipeg and Vancouver, and foreign branches at London, Paris, Berlin, Milan, Brussels, Stockholm, Christiania, Melbourne, Capetown and Buenos Ayres.

In 1858 Berry Brothers made their first Varnish in this old copper melting kettle; capacity, 50 gallons; today they use three batteries with a total of 45 kettles; capacity, 11,500 gallons at a single batch. Their storage capacity today is one and one-half million gallons.

The combined storage capacity at the Detroit and Walkerville works is one and a half million gallons of varnish, and the market for the product is the whole world.

Unscathed by panic or financial disaster, the house of Berry Brothers has weathered every storm and is recognized as one of the soundest and most reliable commercial houses in the country.

Berry Brothers' (Detroit, Mich.) Factory, which is the Largest Manufacturing Varnish Plant in the World.

The death of Mr. Joseph H. Berry, one of the founders of the house, some years ago, while a sad blow to his many friends and employes, had no effect whatever on the standing or conduct of the business, except such official changes as became necessary upon the demise of Mr. Berry, who was chairman of the company.

All the old traditions on which the house of Berry Brothers was built are preserved and maintained by the company. The business policies are also earnestly sup-

plemented by the various heads of departments, most of whom have been connected with the house for long periods of years, and whose interest in the successful conduct of the business is based upon personal regard for the house as much as for interested motives, and with such an "esprit de corps" no house can do otherwise than prosper.

The general managership of this concern is in the hands of J. S. Stevenson, who has been connected with the house for upwards of a quarter of a century, and knows varnish in all its phases as a child knows its alphabet. Mr. Stevenson is withal a chemist of wide attainments, and has besides the executive ability necessary to maintain the general equilibrium of the institution.

The Pacific Coast headquarters of Berry Brothers are in San Francisco, while the factory is located at Alameda. The Western factory has now been in operation since January first of this year, and it has shown a steady and healthful growth. This takes care of all shipments to Washington, Oregon, Idaho, Nevada and California; also export trade in the Hawaiian Islands, Western Mexico, the Philippines, Alaska and the

Walkerville, Ont., Berry Brothers' Canadian Factory

Orient. They extensively import gums and oils from the latter place.

Large warehouse stocks are maintained in the principal coast cities, including Seattle, Portland and Los Angeles, from which the interior points are supplied, thereby insuring efficient service.

The Western Division is equipped with a corps of experienced varnish men, several of them being of long standing with the company, and they are ready at all times to offer such assistance to architects in completing their specifications as might be required, although they publish a complete treatise on this subject as follows:

Architect's Varnish Specifications

As submitted by Berry Brothers, Detroit, Mich.

Liquid Granite

The Varnish for Floors—This is the most durable floor varnish made, combining the three principal requisites of a perfect floor finish—elasticity, durability and appearance. It has stood the actual test of severe and constant service for over thirty years and is recognized by master painters as being the best article of its kind on the market. As a floor varnish it has never been equalled and there is more Liquid Granite in use today than any other floor varnish.

Specify as follows—Two coats of Liquid Granite applied over one coat of Berry Brothers' Paste Filler on open grained woods, on close-grained woods omit the filler. Eliminate the use of shellac and liquid wood fillers on all floor work.

Luxeberry Wood Finish White

For General Interior Trim—This is an interior varnish of the highest quality and should be used on all specifications where the finest gloss or rubbed finish is required. It is very pale in color, is full-bodied, flows perfectly, and dries with a full, rich and durable finish. It is strongly recommended for all kinds of interior woodwork, for the finest offices and public buildings or wherever the highest class of work is desired. It is made from the best gums and especially treated oils. It possesses great durability, dries dust-free in a few hours and under good weather conditions can be rubbed in about three days. It is to be rubbed with pumice and water for a flat finish, or with pumice and oil when a soft velvety finish is desired. It will also take and retain a beautiful polish.

Luxeberry Wood Finish Light

This material is of the same high quality as Luxe-Wood Finish "White," only that it is not so pale in color, but it can be used on the majority of woods without discoloring them in the least.

Note—Luxeberry Wood Finish is the registered trade mark name now used to designate the finish long and favorably known as Berry Brothers' Hard Oil Finish. The name was changed to Luxeberry Wood Finish to protect the public against the many cheap imitations on the market sold as so-called hard oil finishes.

Specify as follows: One coat of Berry Brothers' Stain, one coat of Berry Brothers' Paste Filler, one coat of Berry Brothers' S. D. C. Shellac and three coats of Luxeberry Wood Finish. On close-grained woods omit the filler.

Elastic Interior Finish

For Interior Trim Subjected to Severe Usage—Intended for interior work subjected to severe exposure or usage. It possesses great elasticity and durability, and will resist the action of hot water, soap, etc., to a greater degree than any other varnish.

Specify as follows: On open-grained woods, one coat of Berry Brothers' Stain, one coat of Berry Brothers' Paste Wood Filler, one coat of Berry Brothers' S. D. C. Shellac, and two coats of Elastic Interior. On close-grained woods omit the filler.

Luxeberry Spar Varnish

For Front Doors, Store Fronts and Such Exterior Work as is Subjected to Severe Exposure and Changing Weather Conditions—This material is the standard of quality in a spar varnish, and has a reputation fifty-five years old. The varnish is made especially for use on all types of marine architecture wherever a durable and lasting finish is desired. It can be used as both an exterior and interior varnish, as it is made to withstand severe wind, weather and water exposure and does not turn white.

Specify as follows: Two coats of Luxeberry Spar Varnish, over one coat of Berry Brothers' Paste Wood Filler on open-grained woods. Omit the filler on close-grained woods.

Lacklustre

For General Interior Work where Economy in Labor is a Consideration—This ideal one-coat finish accomplishes with one coat what heretofore necessitated a coat of stain and a coat of wax. The method of application is easy—apply with a rag and wipe off with a clean piece of cheesecloth, producing a soft and almost lustreless finish, as it contains no wax and has none of the disadvantages of a waxed finish. It will not collect

dust, neither will it spot white, and varnish can be applied over it without the necessity of preparing the surface as in the case of wax.

Manufactured in the following colors: Green Flemish, Brown Flemish, Black Flemish, Silver Gray, Mission, Light Weathered, Dark Weathered, Filipino, Golden, Antwerp, Forest Green, Bog. Special shades furnished upon request.

Dulgloss

For Interior Trim Work where a Flat Varnish is Desirable—This material produces in one coat an imitation rubbed effect over a shellaced varnished surface. It is light in color, flows freely under the brush, dries dust-free in about an hour and hardens in twelve hours with a soft velvety finish which is so much in demand.

Specify as follows: For imitation waxed effect—one coat of Berry Brothers' Stain, one coat of Berry Brothers' Paste Wood Filler, one coat of Berry Brothers' S. D. C. Shellac and one coat of Dulgloss.

For imitation rubbed effect—one coat of Berry Brothers' Stain, one coat of Berry Brothers' Paste Wood Filler, one coat of Berry Brothers' S. D. C. Shellac, two coats of Luxeberry Wood Finish and one coat of Dulgloss.

On close-grained woods omit the Filler.

Luxeberry White Enamel

For Bath Rooms and Bed Rooms—This enamel is especially designed for the practical finisher and decorator. It possesses full body, flows very freely, and dries without showing brush marks. It will rub perfectly in three to four days, and can be polished on the fifth day to a piano finish. It can be used on the finest interior or furniture work. It is pure white in color and stays white.

Note—We can also furnish ivory white and pearl white tints when desired. If an egg-shell gloss or imitation rubbed effect is desired, we will furnish it at the same price as the high gloss goods.

Luxeberry White Enamel Primer

Especially designed for use under Luxeberry White Enamel. It is much better than a zinc coat, holds up the enamel coat perfectly, and never fails to produce the desired result.

Specify as follows: Two coats of Luxeberry White Enamel applied over two coats of Luxeberry White Enamel Primer.

Shingletint

For Half-Timbered Work or Shingle Stain Specify —"Shingletint" represents the highest results yet attained in the manufacture of shingle stains. It possesses great penetrative and preservative qualities, being a scientific combination of colors finely ground in pure linseed oil, creosote oil and the necessary drying agents. It prolongs the life of the shingles by retarding decay, at the same time imparting a very artistic finish.

Berry Brothers' Cement Coating

The adoption and increasing use of concrete as a building material has created a demand for a coating for exposed concrete surfaces.

To meet it we have perfected a finishing material especially devised and adapted for this purpose which is known as Berry Brothers' Cement Coating.

It is a sanitary preservative coating for all cement and concrete surfaces, excluding dirt and preventing chipping and the formation of dust caused by friction, makes a hard glossy finish and can be rubbed if desired.

It is suitable for both interior and exterior work, and is not affected by water.

It is especially adapted for floors of garages, factories, hospitals, schools, etc., where the maintainance of sanitary conditions is of unusual importance.

We make Cement Coating in four colors and transparent, and solicit inquiries from anyone interested in a handsome, healthful and economical finish on cement and concrete surfaces.

Berry Brothers' Floor Wax

For interior Wax Finish—A new combination of hard waxes, especially adapted for finishing purposes. Easy to apply. Makes a hard finish. Will not soften after applying.

Directions for Use—Open-grained woods like Oak, Chestnut, Ash, etc., should be first filled with Berry Brothers' Paste Filler.

Allow the Filler at least 24 hours to harden and then apply a coat of floor wax with a rag. Let it remain a few minutes, then use a long-handled weighted floor brush to bring up the finish.

It is well to rub the floor with the grain and then across the grain to get the best results.

A final rubbing with a soft dry cloth improves the finish.

In waxing old worn floors that have been finished with varnish or shellac, clean the surface well with turpentine and then use the wax as directed above, omitting the filler coat unless the floor is badly worn in places.

Close-grained woods like Maple, Pine, etc., do not need filling.

In finishing furniture or interior trim with wax, the method is the same as for floors, except that the long-handled brush is not necessary. After applying the wax, a small stiff brush can be used to polish with, and a soft cloth to finish up. A second coat of wax can be given if more gloss is wanted.

Facts Worth Remembering

All opened-grained woods such as Oak, Ash, Chestnut, etc., should be filled with Berry Brothers' Paste Filler to match the color of the wood, or to match the color of the stain if the wood is stained.

Close-grained woods such as Pine, Maple, Gumwood, etc., need no filling, but a first coat of Berry Brothers' S. D. C. Shellac is desirable and is especially so on Pine. The shellac coat should be applied directly to the wood and then finished in the natural color and should follow the staining when the wood is stained.

The use of liquid fillers is not desirable for high grade work and should never be used on floors.

Condensed Facts on Covering Capacities

A gallon of Varnish will cover approximately 600 square feet, one coat.

A gallon of Shellac will cover from 500 to 600 square feet.

A gallon of Water Stain covers about 500 square feet on open-grained woods, and on close-grained hard woods, 50 square feet more. On soft woods a gallon of Water Stain will cover from 400 to 500 square feet.

A gallon of Spirit Stain will cover from 300 to 400 square feet.

A gallon of Oil Stain will cover about 550 square feet.

From 6 to 8 pounds of Paste Filler made up to volume of one gallon will cover approximately 300 square feet of surface.

A gallon of Shingletint covers about 160 feet, one coat if brushed on; 1½ gallons cover the same surface, two coats. From 2¼ to 2½ gallons of Shingletint will dip 1,000 shingles and another gallon is enough for a brush coat in addition after the shingles are laid.

The above estimates will vary according to the method of application and the nature of the wood. The covering capacity is naturally greater on close-grained hard woods, than on soft woods, as open-grained or soft woods will absorb a greater amount of stain.

For any further details and suggestions on wood finishing, please see our book, "Natural Woods and How to Finish Them."

Special Note

For the benefit of all inquirers, we maintain a technical correspondence department and also a perfectly equipped finishing room, presided over by an expert wood finisher, and a corps of competent assistants.

If you want to see samples of wood finished up in any particular way,

If any points should come up not fully touched upon that you do not fully understand,

If you want advice as to the use of varnish, or on the treatment of woods to get the best results in the way of a finish,

If you are in doubt on any matter concerning varnish or its uses, or on the subject of wood finishing in any of its phases,

ASK BERRY BROTHERS

Asbestos "Century" Shingles

The Asbestos "Century" Shingle, manufactured by Keasbey & Mattison Co., Ambler, Pa., is composed of approximately 15 per cent of carefully selected Asbestos fibre and 85 per cent of Portland or hydraulic cement. It is made by a process which builds the material up, layer on layer, similar to the making of a book, yet each layer is part and parcel of the next layer although, structurally, the sheet is of distinctly laminal type, possessing all of the strength, toughness and elasticity

Roof and sides covered with Asbestos "Century" Shingles. Bungalow owned by W. E. Crawford, Cincinnati, Ohio.

which such a process of creation must necessarily produce, precisely as nature has formed the most enduring of her works. Every material of mass-concentrated structure must have its weak and vulnerable points, parts that are weaker than others, and it is only the structure of superimposed layers where one layer strengthens the next (for their weak places cannot all occur at the same point in each layer) that can hope to produce a material of maximum strength and toughness. Of course the pressure of nearly seven hundred tons to the square foot, which the sheet receives after it is built to its required thickness, knits it finally into the one uniform sheet, called the Asbestos "Century" Shingle, which is so exceedingly meritorious for roofing purposes.

The Asbestos "Century" Shingle is absolutely fireproof, waterproof and indestructible by all natural climatic conditions. The reports of the United States

Roofed with Asbestos "Century" Shingles. Residence on Bitter Root Stock Ranch, owned by Mrs. Marcus Daly, Hamilton, Mont.

Government indicate that hydraulic cement continues to crystallize for a period covering several decades, during which time it is constantly becoming stronger and harder. The Asbestos "Century" Shingles may be likened to any other concrete construction, the Asbestos fibre being substituted, in the case of the shingle, for the reinforcing which is ordinarily used in other forms of cement structures. The Asbestos fibre is fireproof and, being a mineral substance, lends itself readily to the natural crystallization of the cement which occurs around and about the interlacing fibres, resulting in a material which has proven, through an experience of many years of service in this country and in Europe, to be impervious to the ordinary action of the elements and is practically everlasting and indestructible.

The Asbestos "Century" Shingle is not difficult to apply, any mechanic having ordinary mechanical skill being fully qualified to follow the instructions supplied for his guidance with each initial shipment.

A roof on which Asbestos "Century" Shingles are to be used should be framed so that there is a rise of six inches to the foot, or the equivalent of one-quarter pitch; the rafters should be covered with reasonably well-matched sheathing boards; the sheathing boards should then be covered with slater's felt or "Keasbey & Mattison" Waterproofing Paper; and then the Asbestos "Century" Shingles applied over that in accordance with our blueprint instructions.

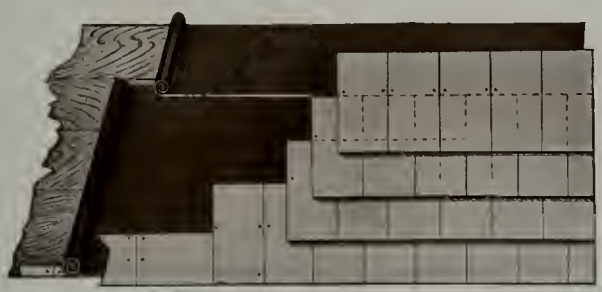
Asbestos "Century" Shingles can be cut with an ordinary hand saw, but a still better method is to use either a slater's jack and hammer or procure a sharp-pointed steel instrument, for instance a No. 6 or No. 7 slim-tapered file, score the material several times along the desired line of cleavage and then break it in a manner similar to that employed in breaking glass. You will find the material lends itself admirably to the latter treatment.

The material itself is considerably lighter in weight than natural slate or tile; in fact, a square of Asbestos "Century" Shingles, applied in the French or Diagonal Method, will weigh about the same as wooden shingles.

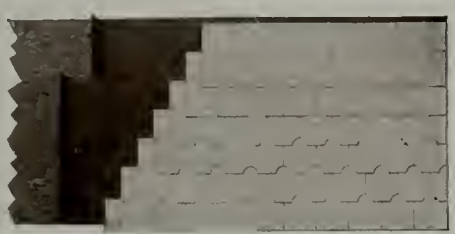
They manufacture more than threescore standard sizes and shapes of shingles, in three standard colors, and will willingly furnish estimates upon receipt of

blueprints of areas to be covered. They have quite a large variety of shingle which are cut to special shapes for use as trimmers or for other decorative purposes. The following list describes the five shingle shapes and sizes in most general use, according to "American" method:

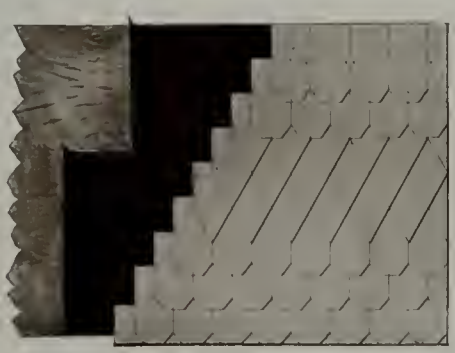
Architect's specifications for the application of Asbestos "Century" Shingles or Asbestos Roofing Slates to be applied after the "American" method, should read exactly the same as for natural except that a 2" head-lap should be specified instead of the usual head-lap employed for natural slate, except certain shapes which specifically call for a 3" or larger head-lap.



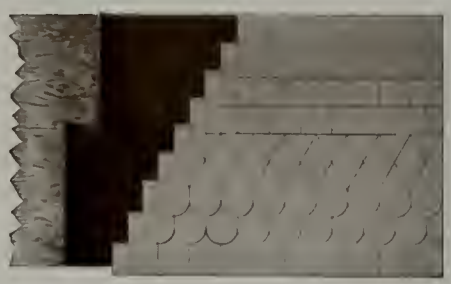
This is the usual square butt shingle (No. 16) commonly employed in laying either natural slates or Asbestos "Century" Shingles by the "American" method.



Nos. 72, 77 and 82 (priced on page 58 of the Asbestos "Century" Shingle Catalog), employed as a band course to break the straight and even lines when laid according to the "American" method. This style or shaped shingle is frequently used for siding, especially in the gables, etc.



This illustration shows Nos. 49, 54, 59 (priced on page 61 of the Asbestos "Century" Shingle Catalog) and 53, 58 and 63 (priced on page 56 of the Asbestos "Century" Shingle Catalog), employed as band courses to break the straight and even lines when laying any of the straight "butt" shingles according to the "American" method; also quite frequently employed for siding and for gables of buildings as well as porches, etc. Their use is unlimited.



This illustrates the effect produced by Nos. 68, 73 and 78 (priced on page 57 of the Asbestos "Century" Shingle Catalog), when laid according to the "American" method, employing Nos. 53, 58 and 63 (priced on page 56 of Asbestos "Century" Shingle Catalog) as a band to break the even appearance of Nos. 68, 73 and 78.

When Nos. 70, 75 and 80 are laid according to the "American" method with a two-inch head-lap over the head of the second course below we have a true hexagonal effect. This style or shaped shingle is applied in many sections for siding as well as roofing and gives a very pleasing "honey-comb" appearance.

✧ ✧ ✧

Digest of Business Conditions.

FAVORABLE.

1. **Crop Outlook.**—Largest winter wheat crop on record virtually harvested. Other growing crops with ideal weather conditions making splendid progress. Early damage to cotton crop being rapidly recovered.

2. Indications of willingness of **Administration to hear what business has to say,** in other words to recognize the business interests of the country as a factor to be heard on legislation affecting their interests.

3. **Politics.**—Prospect of Republican majority being returned in House of Representatives through November election, and a rest to business from radical legislation for awhile.

4. **Labor conditions** improving through demand to harvest bumper crops. The fact that conditions of the past six months have been survived without reduction in wages a hopeful sign.

5. **Gold.—Outflow of gold stopped;** $80,000,000 shipped since January 1st has not been felt in monetary circles and will return, as Europe must buy heavily of our wheat and cotton.

6. **Surplus Funds.**- Not since 1908 have New York banks held such large deposits for Western account.

7. **Easy money market** in spite of heavy Claflin and other failures.

8. **Adverse news taken with composure,** and evidences of eagerness to respond to good news.

9. **Liquidated Condition of Business.**—Never was there less speculative excess or smaller stocks; prices low.

10. **Rapid decline in idle cars** imminent to move crops.

11. **Mexican situation improving.**

12. **Strong position of foreign banks.**

13. **Purchases of merchandise increasing,** result of actual urgent needs that can no longer be held up, especially in iron and steel trade, and shown by the equilibrium now on unfilled order books.

14. **Sentiment improving,** indications that June marked climax of depression, and that from now on confidence and business will slowly improve.

15. **Improvement in price and demand for copper.**

UNFAVORABLE.

1. Determination of Administration to push new business regulation laws in the face of universal protests of the business interests of the country, accompanied with the effort to make the people generally believe that conditions are good and that they have not been affected by recent radical legislation. An effort to array the Administration and the wage earners against so-called selfish business interests.

2. **Heavy falling off in exports and heavy increase in imports** continues, with growing adverse international balance.

3. **High cost of living,** and cost of extravagance and high living.

4. **Railroad earnings** show increased shrinkage; some relief must come in increased revenues. The horse to pull our business cart exhausted through lack of nourishment.

5. **Increased Failures.**—The credit of the dry goods trade curtailed by Claflin failure and fears that far-reaching effects may yet have to be reckoned with.

6. **Tariff.**—Effect of tariff reduction with our manufacturers being felt and to continue for a long while, and will become serious should business abroad continue to fall off.—The Steel and Metal Digest.

Professional

"Architect, 31, married, eleven years practical experience in architects' offices, mostly New York City, now practicing in South, desires to enter partnership relations with live architect in Mountain or Coast states. Address XXX, Pacific Coast Architect."

Trade Notes

Architect E. B. Scott has moved from 1207 to 712 Humboldt Bank building, San Francisco, Cal.

Architect James Peddle, Pasadena, Cal., has moved from the St. Louis building to 521 North Fair Oaks avenue

Wm Templeton Johnson, architect, San Diego, Cal., is in the mountains of north California to spend the summer.

C. H. Russell Co., architects, have moved from the Union League building to 1112-5 Story building, Los Angeles, Cal.

Architect John Reid, Jr., has moved from the Chronicle building to room 1300 First National Bank building, San Francisco.

Architect E. P. Antonovich, 422 Monadnock building, San Francisco, has been in San Diego on business this month for about three weeks.

The Architectural firm of Henry Hall Johnson & Co., has opened offices at Great Falls, Mont., still retaining their Seattle place of business.

The Victoria (B. C.) Builders Exchange and Victoria Chapter (B. C.) Society of Architects will make a joint exhibit at the Dominion Fair to be held in September.

Goodrich & Goodrich, architects, formerly on the third floor of the Abington building, have moved to a larger suite of rooms at 227 and 228, the same building, Portland, Ore.

William Curlett & Son, architects, announce the removal of their offices from 1024 Title Insurance building to 518 Merchants National Bank building, 6th and Spring streets, Los Angeles.

Eugene Layman and J. Baumgartner, San Diego, Cal., are now working in the office of Bristow & Lyman, architects, completing plans and specifications for the University building at Tucson, Ariz.

Architect A. L. Haley, well known in Los Angeles, has recently opened an office at 646 Monadnock building, San Francisco, where he is making plans for a $1,000,000 factory to be built in Oakland, Cal.

Architect Wm. F. Thompson, Los Angeles, Cal., has opened an office at 819 Marsh-Strong building. Mr. Thompson has some architectural commissions in hand which will probably soon be ready to announce.

N. Clark & Sons report that they have recently closed a large contract to furnish the architectural terra cotta in the new ten-story Stockton Commercial Bank building, to be erected in Stockton, Cal. L. B. Dutton & Co. are the architects.

Architect Mark Daniels, of the firm of Daniels, Osmont & Williams, San Francisco, has been appointed Landscape Architect and Superintendent of National Parks. This is under the Department of the Interior at Washington, D. C., but Mr. Daniels will still retain his connections with the firm.

Architect Richard C. Farrell, Los Angeles, who has been associated with Architect Wm. S. Garrett under the firm name of Garrett & Farrell, has been appointed by A. H. Daum, Supervisor of Construction of the Los Angeles Board of Education, to take charge of the architectural work to be done under the latter's direction.

Architects have long been looking for a good tracing paper of sufficient strength and transparency to take the place of tracing cloth, in order to reduce their expenses. This long-felt want has been filled by The Frederick Post Co. of Chicago, and the No. 177 Velour Tracing Paper offered by this firm has been adopted by a great many leading architects all over the country. Samples or information can be obtained by writing to the Pacific Coast branch at 537 Market street, San Francisco.

The volume of business done by W. P. Fuller & Company has reached such proportions that their immense manufacturing plant is inadequate to keep pace with their sales. They are now adding a new building to their group which will relieve the congestion in their Mixed Paint Department. This building will be of reinforced concrete construction with brick facing, will be three stories high and will cover a ground area of 58½x140 feet. It will be equipped with the most modern machinery and will be a splendid addition to the plant, which is already by far the largest of its kind on the Pacific Slope.

CALIFORNIA.

San Francisco—Architects Rousseau & Rousseau, Monadnock Building, have completed plans for a five-story and basement Class C construction apartment house, to be erected on the north side of Post Street, west of Larkin, at a cost of $40,000.

San Francisco—Architect Edw. T. Foulkes, Crocker Building, has prepared plans for the construction of four one-story frame and plaster concession buildings for Mr. McConnell, which will cost in the neighborhood of $160,000.

San Francisco—Architect Lewis P. Hobart, Crocker Building, is now preparing working drawings for a large exhibit building, one story and basement, frame and plaster, which will cost $45,000, for the New Zealand Government.

San Francisco—Architects Cunningham & Politeo, First National Bank Building, are preparing plans for a two-story and basement Class A building for stores and dance hall, for Mr. Walter E. Dean, at the corner of Eddy and Jones Streets, the estimated cost of which is $75,000.

San Francisco—Architect Frederick H. Meyer, Bankers' Investment Building, has completed plans for the construction of a five-story and basement Class C apartment house, for G. A. Steffen, to be erected at the corner of Taylor and Sacramento Streets. It will be of pressed brick and terra cotta and will cost $45,000.

San Francisco—Architect Houghton Sawyer, Shreve Building, has completed plans for the construction of a seven-story and basement Class A apartment house which will cost $100,000.

San Francisco—Architect John Bauer, Sheldon Building, has prepared plans for the construction of a two-story and basement reinforced concrete hospital for the San Francisco Home for Incurables, which will cost $55,000.

San Francisco—Architect Henry C. Smith, Humboldt Bank Building, has prepared preliminary plans for a two-story and basement brick or reinforced concrete residence for Mrs. Clarence Musto at Vallejo and Divisadero Streets, which will cost $45,000.

Hillsborough—Architects Havens & Toepke, 46 Kearny Street, San Francisco, have prepared plans for a two-story and basement residence to be erected on the corner of Santa Inez and Mifford Avenues for George H. Shreve.

San Jose—Architect Louis Lenzen, 110 S. Second Street, has prepared preliminary plans for the construction of a four or five-story and basement Class A lodge hall for the Native Sons of the Golden West, on N. First Street, south of Santa Clara Avenue, which will cost $100,000.

Hanford—Architect Ernest J. Kump, Fresno, Cal., is preparing plans for the construction of a two-story and basement reinforced concrete hospital for the St. Dominican Sisters, which will cost $40,000.

Sacramento—Architect L. G. Burgren, Holbrook Building, San Francisco, is preparing plans for the construction of a nine-story and basement Class A hotel, to be of steel frame and reinforced concrete, and to cost $225,000.

Sacramento—The Sacramento County Board of Supervisors has selected Architect R. A. Herold of Sacramento, Cal., to make plans for the group of County Hospital buildings, that will cost when complete about $250,000.

The same architect is completing plans for adding five more stories to the Forum Building, which, when complete, will be the largest building in Sacramento and ten stories high.

Fresno—Architect George B. McDougall, Sacramento, Cal., is preparing plans for the construction of the new Fresno State Normal School, which is to be of brick and steel, to cost $265,000.

Woodland—Architect W. H. Weeks, San Francisco, Cal., is now preparing plans for the construction of a one-story and basement reinforced concrete library for the town of Woodland.

Norwalk—Architect George B. McDougall, Sacramento, Cal., is preparing preliminary plans for a two-story brick hospital group, which will cost $160,000.

Los Angeles—Architects Foss Designing Co., 100 E. Colorado Street, are preparing plans for a two-story frame and plaster residence for W. J. Bettingsen, which will cost $75,000, and to be erected on Hillcrest Avenue, in the Oak Knoll district.

Los Angeles—Architect George F. Costerisan (J. F. Kavanaugh, associate), 922 California Building, is preparing plans for a five-story and basement Class A reinforced concrete warehouse, to be erected on the northeast corner of Griffith Avenue and Thirty-first Street, for the Dixon Art Glass Co., at a cost of $60,000.

Los Angeles—Architects Morgan, Walls & Morgan, 1136 Van Nuys Building, have prepared plans for the construction of the eight-story and basement reinforced concrete office building to be erected at Sixth and Los Angeles Streets for William G. Kerckhoff at a cost of $160,000.

OREGON.

Portland—Architects Whitehouse & Fouilhoux, Wilcox Building, are preparing plans for the construction of a two-story and basement brick and stone residence for C. G. Murphy, which will cost $25,000.

Portland—Architect F. A. Naramore, Superintendent of School Properties, is preparing plans for a one-story hollow tile construction school for the city of Portland, which will cost $36,000.

Portland—Architect C. A. Duke, Failing Building, has completed plans for the construction of a three-story and basement brick apartment house for H. Meier, 341 Sixteenth Street, at a cost of $35,000.

Portland—It is stated that owing to the consolidation of the First National Bank and the Security Savings and Trust Bank a fireproof building will be erected on the southwest corner of Fifth and Stark Streets at a cost of $300,000 to $400,000.

Portland—Plans and specifications are being completed by Architects Tourtellotte & Hummel, Rothchild Building, for the proposed $45,000 hospital to be erected on Commercial and Graham Streets, of reinforced concrete and four stories high.

Eugene—Architect Hunzicker & Preusse have completed plans for the construction of a three-story brick high school to cost $110,000.

La Grande—Architects Houghtaling & Dougan, Henry Building, have been commissioned to prepare plans for the Elks' Lodge. It will cost $80,000.

North Bend—Architects George Courtney is preparing plans for the construction of a five-story and basement brick and steel hotel, which will cost $100,000.

Medford—Architect Oscar Wenderoth, Washington, D. C., has completed plans for a two-story and basement brick and stone post office for the U. S. Government, which will cost $80,000.

WASHINGTON.

Seattle—Architect George C. Mimmons, Peoples' Gas Building, Chicago, Ill., is preparing plans for a nine-story and basement reinforced concrete factory and warehouse for Sears-Roebuck Co., Chicago, at a cost of $850,000.

Seattle—Architect A. Warren Gould, American Bank Building, has prepared plans for the construction of a three-story and basement reinforced concrete steel and stone court house for the city of Seattle, which will cost $906,973.

Seattle—Architect J. Merrill Brown, Northern Bank Building, is now preparing plans for the construction of a three-story and basement reinforced concrete natatorium for Erwin Baruch, which will cost $100,000.

Seattle—Architect J. L. McCauley, New York Block, has completed plans for a ten-story and basement reinforced concrete hotel for the Rainier Heat & Power Co.

Bremerton—Architect Harlan Thomas, Arcade Building, Seattle, has been commissioned to prepare plans for the construction of a two-story concrete and steel office and bank building for the Bremer estate at about $20,000.

Seattle—Architects Saunders & Lawton, Alaska Building, have prepared plans for the construction of a three-story and basement steel and reinforced concrete lodge building, for the Seattle Masonic Temple Association, which will cost $120,000.

Tacoma—Architect Bruce G. Humes has completed plans for the construction of a three-story and basement brick and steel apartment house for E. Hutchinson, which will cost $60,000.

MISCELLANEOUS.

Vancouver, B. C.—Architects Parr, MacKenzie & Day, Vancouver Building, Vancouver, B. C., are preparing plans for the construction of a four-story and basement Class A theater for Klaw & Erlanger, New York, at a cost of $1,000,000.

Vancouver, B. C.—Architects Honeyman & Curtis, 821 Pender Street W., have completed plans for the construction of a four-story and basement hotel, to be erected on the lot adjoining the present Blackburn Hotel on Main Street, near Hastings, for the J. J. Frantz Construction Co., which will cost in the neighborhood of $75,000.

Vancouver, B. C.—Architect W. C. F. Gillam, N. W. Trust Building, has completed plans for the construction of a $125,000 school building at North Vancouver.

Voncouver, B. C.—Plans are being completed for a new postal station and office building, to be erected at Gove Avenue and Keefer Street, which will cost $250,000.

Victoria—Architect J. C. M. Keith is preparing plans for a city jail which will cost about $70,000.

Victoria—Plans have been prepared by Architect C. E. Watkins for a one-story building of brick, with six stores, to cost $25,000.

Tucson, Ariz.—Architect Henry Jaastad has completed plans for the new church to be erected at the corner of Ninth Avenue and Fifth Street for the Spanish American Methodist congregation.

Phoenix, Ariz.—Plans will soon be prepared for a new church edifice for the First Presbyterian Church, which will cost $100,000.

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Clears quickly of water.
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Will outlast the building.
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SAN FRANCISCO
CALIFORNIA

VOLUME EIGHT
NUMBER THREE

SEPTEMBER, 1914

THE
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EDITORIAL

Architects Are Held Responsible

Discussing fire hazards in schools, and plans to avoid them, several writers recently gave especial emphasis to their convictions as to the responsibility of architects. Nothing was said about the limitation, by inadequate appropriation, of the efforts of architects to provide the safest possible structures.

"Architects," says a writer in Safety Engineering, "have the greatest knowledge of planning and construction, they know the fire-resistance of materials and have the greatest chance in planning new buildings to convince the committee in charge of the necessity of the best protection against fire. It is to the interest of every architect that his building shall be constructed in the best possible way and that his public shall know why it is the best. In case of accident due to poor arrangement it is the architect who receives well-deserved public censure."

In his next sentence, this writer, Frank Irving Cooper, a Boston architect, says that "even Boston" builds outlying schools of second-class construction. But he reiterates:

"An informed and awakened public will demand that an architect shall design school buildings to meet the demands of educators and protect the lives of the school children. When the law holds him criminally responsible for faulty planning and construction, reform will be immediate."

Competition is responsible for many shortcomings. This and restricted expense, hurry to build schools before communities feel able to provide the best; and the various ideas of school board members, are much oftener the cause of fire hazard in schools, than lack of foresight, equipment for the work, or ability, or lack of ordinary interest in human welfare on the part of the architect. Give him a chance and he will provide a building in which fire will have almost no chance at human life.

Important Building Law Now Effective

An amendment to the building laws of Boston, Mass., of wide-spreading importance, goes into effect early in August. The new provision reads: "No material other than Brick, Tile, Slate, Metal, Asbestos Shingles or Slag shall hereafter be used to cover or roof any building, or the tops and sides and outsides of the frames of any dormer window, or any projection of the roof of any building except wooden cornices or wooden frame buildings, but on flat roofs composition or tar and gravel may be used or such other quality of fire-resisting roofing as the commissioner may authorize."

To the person uninformed and not conversant with such matters, this ruling might appear to be a very simple matter, but to those persons interested in fire preventative methods, it will be received with considerable pleasure. As a matter of fact this amendment to the building laws of Boston is a reform of vital importance and, as such, is worthy the consideration of all persons interested in building activities.

It is unnecessary to state that fires, as a rule, do not start from the tops of buildings, but once let a fire get under headway and it travels across the rooftops at express speed. Sparks and embers that lodge in a high wind, and in dry shingles, quickly ignite. Just a small blaze, started in this manner, will tear through a wooden frame and shingle district in less time than in any other possible way. The roofs furnish the headway and the roofs—the kind that the Boston authorities have forbid—are alone to blame for the rapid spread of some of our great conflagrations of recent years. We have in mind a number of such fires; fires that have started and spread untold destruction, from catching in the easily inflammable roofs of certain sections.

The prevention of fires is a problem that is occupying the attention of municipalities all over this country. This new law of the Boston building board will at once impress and appeal to the authorities of such communities.

Worthy of mention at this time also, is the stringent rules of the City of New Orleans. Here's a city that has even gone a step beyond Boston. It forbids even the patchwork upon roofs already built of wooden shingles to be of that material.

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Brick Veneer For Residences

Present residence construction is generally tending toward wood veneered with some more permanent material. Brick for this use seems to be the best material. When laid up well it does not show cracking to catch dirt and allow the ingress of storm water. It may be varied into many designs and surely gives the most substantial appearance. It needs no paint and has superior lasting qualities. In all, structurally and architecturally, it cannot be equalled by any material used in present building practice.

Competitions Cause of Big Annual Loss

Increasing cost in the preparation of competition drawings, and of sketches, is a source of no small worry to the architects of this country. Only recently the drawings submitted in the New York County Court House competition are said to have cost each competitor over $5,000 each, representing in bulk a total outlay of over $250,000 by the competing architects—an absolute waste of money.

This comes pretty near reaching the high water mark for such figures, and if the tendency for such financial waste continues to increase at the pro ratio of the past few years, we'll certainly hold our breath in figuratively discussing future competitions.

Salem Rebuilding Commission Is Busy

The Rebuilding Commission of Salem, Mass., has adopted rules forbidding the erection of wooden buildings more than two and a half stories high in the fire district. Even this class of construction must have fireproof roofs, metal gutters and plastered cellars. The commission is also giving considerable thought to the construction of factory buildings and has issued an order to the effect that hereafter structures for factory purposes must be of fireproof construction throughout. They must be rated first class and of semi-fireproof construction even outside the fire district, with self-sustaining fire-resisting walls and fireproof roofs, gutters and basements.

Record of School Fires in This Country

Building officials of New York City have issued a comprehensive volume of nearly three hundred pages, with charts presenting the results of extensive investigations in this country and abroad. Definite facts concerning the buildings of New York City are set forth in interesting array, together with comparative conditions in other cities. This investigation opens a new line of community study and should prove of value to interested municipalities.

An Organization of Real Influence

The Builders Exchange has been likened unto a clearing house in that it serves this purpose for the vast amounts of capital expended annually for constructive purposes.

There can be no doubt about the importance of such a body to the growing community. It stands for honesty in all things. The integrity of a firm or individual must be unquestioned before they can aspire to membership in such an organization; the business transactions of such aspirants must be legitimate, open and above board.

Builders Exchanges are said to be often misunderstood regarding their stand on the labor question. When such an organization expends activity and interest along this line, it is not because of any opposition to labor itself; its endeavors first and foremost are to stabilize and more generally equalize the wage for efficient labor. Hence it stands against the "closed shop."

At heart, the officials of the average Builders Exchange hope and work for the betterment of labor conditions. Let no man misunderstand the influence for good that a Builders' Exchange excites in any community. It is more often working for the permanent welfare of that town or city wherein it may be located, than the average person has any conception of.

An Interesting and Comparative Report

An interesting compilation of figures, enumerating a list of school fires has been recently published, covering that period since the year 1911.

It is to be noted that the approximate loss per year of such fires exceeds $3,000,000, while the individual loss per school averages $25,000.

Despite the modern fire-fighting methods of this twentieth century, the annual loss by fire is increasing, rather than diminisihng. Of course this does not indicate a fault in the activities of our fire-fighting departments, for it must be remembered that the total physical valuation of school properties appreciates materially with the passing of each year. However, it does show the need for more efficient preventative methods.

It is surprising to learn that it is not in the public schools that fires are most frequent. Out of 265 fires counted in a period of twenty-seven months nearly sixty percent were in private schools and colleges. Estimates of the frequency of fires are as high as ten a week. It has been said that a school, college or some sort of an educational building burns, or partially burns, each day in a school year.

But to return to the necessity of better preventative methods, let us first consider the statement of an investigating board which declared that fully one-half the school buildings in certain of our states were totally unfit for use in one way or another. Large numbers of schools were pronounced overcrowded, insufficiently ventilated and with unsafe heating apparatus, combustible construction, wooden stairways and doors swinging inward.

It stands to reason that all the fire drills ever invented would not compensate for errors in building design and construction. Fire drills are efficient—they have to be in view of the construction of certain of our educational institutions. But does that justify quick-burning constructions in the school houses?

Judging from the above-mentioned report and statements of our leading architects it would appear that the chief blame for these conditions would lie in the privilege that some persons have in putting up four walls with a filling of wooden timbers, joists, boards and what not and then "put it up" to the children or students to get out safely in case of fire. And then again some people have the notion that just so long as a safe exit be made it does not matter if the building burns.

We all know what the remedy is; there is little use in discussing it. The architect who specializes in school construction is, assuredly, familiar with the proper fire-fighting apparatus, to be embodied in the construction of school houses. If he hasn't that knowledge—well, he ought to seek another vocation. But it is not our intention to discuss this side of the question. In fact, we have doubts whether or no we can discuss it. The point is, however, that "the barn should be locked before the horse escapes."

Regarding the old buildings that now stand, it should be the duty of every community to make some adequate preparation for the safety of the occupants in case of fire. When we say adequate we mean just that word and not the definition that some people put on it, as reflected in the fire-fighting apparatus used in those schools of which one burns down every day.

What to do with the old school houses is answered by one architect, who says:

"In reference to old non-fire resistive school buildings, I think that the simplest and easiest, also the most effective protection to insure the inmates against danger from fire would be automatic sprinkler equipment."

Architectural Style for the School Building

William H. Weeks, Architect.

No other public edifice so intimately concerns so many people as the Public School Building. This is largely due to the general interest in the child life of the community and his training.

In this connection it is well to remember that environment should not be underestimated; a poor environment works toward the stagnation of the mind, while a good environment is at once uplifting and a stimulus to improvement. It is important that the brain of the child be developed through proper training and teaching, but not more important than the eye which should be trained to a higher appreciation of the beautiful in nature and art.

Thru his senses a child acquires knowledge; thru his senses he develops individuality; by surrounding him with the best and most beautiful in nature and art, we can find no more simple form of expression, and no better medium to express the beautiful in architecture, than the Public School Building. In addition, as a child passes thru the various stages of his development, he should be kept in close touch with the best available examples of architecture, as well as the Sciences and of Literature.

Beautiful architecture expressed in a beautiful school building is an important factor in the child's education. The school buildings found in a community, inside and around them, proclaim to the observing the condition of the people, both intellectually and financially, and a sure index of their lives. Aside from the educational value to the child, good architecture is one of the greatest assets in the building up of a community, adding to the civic pride and making a favorable impression on the home seeker.

The important problem, then, is the selection of the design for the new building that will fulfill all requirements of style and arrangement for the success or failure of the finished structure, when judged by the best standards of school work.

The controlling element of any school building is the Class Room and its approach; therefore, all else in a general way must be subsidiary to them. With this in view a style should be selected that will permit of proper orientation and elastic enough to be readily adjusted to the requirements of the arrangement. It is unwise to use any style slavishly; and any style not sufficiently elastic to be adjusted, without loss of symmetry, to modern school requirements.

The selection of the styles best suited to the school building will depend largely on the type of building, location, and its importance as compared to other buildings in a community.

The styles most popular at the present time are Classic and Gothic, and, in our own State, Mission. An historical style is more appropriate for the school than original types that are usually short lived and seldom bear repeating.

To the sacred architecture of Greece, as seen in their beautiful temples, and expressed in its three orders, are we indebted for the best and the purest canons of architecture that the world has ever produced—for hundreds of years the admiration and inspiration of the great architects and are lovers of the world. The refining influence of the beautiful Greek Orders is found in most of the great buildings of the world. No other style can suggest so much to the plastic and romantic mind of the young than this chaste and beautiful one which adapts itself so well to the school building of the better class.

The Gothic style, which did not reach the zenith of its elastic loveliness until the Fourteenth Century, is young compared with the Classic, yet filled with history and romance. In the popular mind Gothic architecture is usually associated with the church edifice, seldom realizing that most of the greatest and finest educational institutions are built in this style. For the University or large school it cannot be excelled as a successful medium—moulding itself so well to the requirements of the modern school.

The so-called Mission style of architecture used in many California school buildings is distinctly Californian. It partakes of the history of the State and is part of it. It is beautiful in its simplicity, admirably suited to our climate, difficult at times to adjust to school requirements. It has been used very successfully in many one-story types of building, but in the higher buildings for school uses, the problem has proven more difficult and seldom is a satisfactory example to be found. This style has been shamefully abused; every monstrosity of plaster and tin without a name has been listed in the ranks of "Mission." The cheap imitation has almost brought this fine California style into disrepute. This is unfortunate, for there are wonderful possibilities for the designer in the adapting of Mission to the finest schools of the State.

The designer confining himself to these styles, with their kindred styles, can find sufficient inspiration to produce the finest type of building.

In regard to the original styles advocated by some architects, there is no disputing the fact that a number of our architects have produced some fine examples, pleasing in outline and well adapted to the school needs. They are, however, much like many new songs—catchy at first, but soon tire on repetition, and not like the old-fashioned songs that never grow old, but take on new charm with the years—and in the hands of great artists can be made a never-ending source of delight.

School Room Lighting

By Charles T. Phillips, C. E.*

Each step in human progress has been marked with a corresponding advance in artificial illumination. It has become such a vital necessity that the elimination of gas and electric light would send civilization backward a far distance.

Higher averages in education are no doubt due to cheap artificial illumniation. The worker who is busy during the day has his nights for study. To the public and private schools that hold night classes, the advantages of the proper application of artificial light are obvious.

In the lower grades, where the habits of life are more readily formed and the various organs of the body are developing, the eye may be started on its way toward defective vision. When this organ is strained by continuous activity under an illumination either artificial or natural, which is either too low or too high, and to which may be added glare effects, the eye gradually dev-

*Consulting Engineer, Pacific Building, San Francisco.

iates from its natural development until it requires for normal vision artificially prepared abnormal conditions.

Many states and cities make it compulsory for school children to have their eyes examined, but, to the writer's knowledge, very little effort has been made to remedy the source of the majority of eye trouble. That remedy consists of the proper lighting of class rooms and assembly halls.

School Room With Indirect Lighting

In several states there are laws in force governing factory lighting, and there are eleven additional states that have at least something in their factory codes referring to factory lighting. It would seem then that if the proper lighting of the work shop is of such importance as to render legislation necessary in its behalf, the same consideration should be given to the school room. The factory owner realizes that his output can be increased by the installation of a system of illumination designed along scientific lines, and there are very few of the modern factories that have not taken advantage of this knowledge. The school officials could well apply this same knowledge to the class room, thereby increasing the mental efficiency of the pupil and instructor.

The services of an illuminating engineer, in connection with the design of class rooms and assembly halls, would save hundreds of pupils the burden of defective sight throughout their life. The conservation of vision should be one of the first considerations in school design, but this important item has apparently been given very scant attention. A thorough knowledge of illumination embraces many subjects, and although a thorough knowledge of physical laws is necessary, an understanding of optics is of far more importance. Being concerned in aiding vision, a knowledge of the functions of the eye is necessary. It is then manifestly illogical, in studying illumination and illuminating systems, to confine the attention to physical conditions alone. Phenomena of physiological optics should be thoroughly understood, and the illuminating engineer's education is not complete without this understanding.

In designing a system of class room or assembly hall lighting, the illuminating engineer has many points to consider, and they may be roughly subdivided as follows: the production of light, the distribution of light, the physiological effects produced by light, and the associated psychological phenomena.

How often do we find beautifully designed school structures, splendidly equipped, but with abominable means of illumination. There is no excuse for this condition since the advent of the professional illuminating engineer, and the many satisfactory devices and appliances now available, together with the skilled application of same, to any problem of school lighting.

Efficiency in light distribution should be considered, not only as to reducing the sum expended for electricity or gas, but to decrease the amount of heat generated by the light source. The heat generated is the thermal equivalent of the energy consumed, less that expended in producing visible radiation, the latter quantity being between 2 and 10 per cent.

The reduction of specular reflection from polished and varnished surfaces in the class room should be given attention, and the same would apply to the glossy paper upon which text-books are printed. The average reader notices with annoyance the glare and lustre from printed pages, especially those upon which half-tone illustrations appear, but he does not realize that more time and effort is consumed in reading and the resultant eye strain is greater than would be if the paper did not have this polished surface.

From tests made in Philadelphia, under the direction of the Board of Education, it was found that an intensity on the reference plane of 2.25 to 2.50 foot candles, using a semi-indirect system of lighting, the efficiency was the highest of several systems and intensities.

The lighting in this case was done with gas, as the school building was not equipped with electric wiring. The readings were made with a Sharp-Miller Photometer and the surface brightness measurements were made with a Lumeter.

In the course of an investigation into the defects of vision among school children in Liverpool, it was found that the vision was better among children attending well lighted schools than among those who attended schools where the lighting was less satisfactory.

Dr. T. A. Woodruff, M. D., in the Illinois Medical Journal, states that the foundation of subsequent eye disease is frequently laid in our schools. Defective vision and eye strain are the causes of many physical maladies, which generally render the child dull and mentally incapable of performing the ordinary school task. The proper lighting of schools would tend to eliminate, to a great extent, this common defect.

It is hoped that in the future that the services of an illuminating expert will be secured in connection with the design of school buildings. The cost of his services will be more than saved in the reduced cost of the installation, but the protection to the pupils' eyes should be the first consideration.

Brick in School House Work

By Nathaniel Ellery, C. E.

The test of time has placed good brick work in the fore rank of modern construction. It long, long ago passed the experimental stage and became a standard material. Passing through the many phases of the vagaries of the builder, it again emerges as the modern standard.

In school house work we look for a fire resisting material, a decorative material, a good structural ma

terial, and in these particulars it splendidly fills the bill. The school house of today should be made of the best fire resisting material extant, and to slight or ignore this feature is little short of criminal. We know without argument brick is the material made by fire and capable of withstanding intense heat. If it be well placed and the other parts of the building are in accord fire will not destroy such a structure.

Should you desire to build a furnace—a heat generating plant, you immediately turn to brick as the material suited for use. The layman knows this, the expert knows it. Then to build the best fire resisting building —build with brick.

We have not yet advanced to a point in building construction where we can employ any other material with equal safety in this regard. Therefore brick stands supreme in this most important position. In the great conflagration in San Francisco in 1906 there stood many monuments in steel and brick, which were grim reminders of good judgment, workmanship and good materials. One has but to look at the photographs taken shortly after that fire and pass judgment. The test was the most severe of any time and yet the good work stood splendidly and the bad work failed. No greater trial need be had to convince of the high efficiency of brick as a heat resistant.

From the architectural view point the great many possible textures, colors and designs to be had in brick and terra cotta extend to the designer a wonderful field for his talents.

Burned clay again defies competition and stands out as a material of the highest architectural value. What cannot be done in brick and burned clay decoration? A study of our best buildings will clearly show the vast field for endeavor and the opportunity to enhance the artistic features of our structures.

To California, there should be pride in its school houses. They should be of good design and artistic in treatment. The opportunity is here for splendid work in brick and terra cotta.

The present day clay products manufactories meet the demands of the architect and turn out materials of many colors and textures, and structural fitness.

The many beautiful school houses of San Francisco erected of brick after the fire, attest this fact. Could our school boards step into the show rooms of our face brick manufactories there they would see the display of the immense possibility in good school work. Structurally, brick is superior for exterior wall work. Set in good cement mortar well burned brick makes for a masonry as if of solid stone. It resists the stresses equal to any material and does not when on proper foundation crack or give as many other materials do. It can be made water proof through the selection of the brick and the proper workmanship. While to paint brick work is to destroy its appearance.

The time required to build with brick is much shorter than other permanent materials. Personally I have watched the wrecking of many old brick structures and have always noted where good materials and work prevailed there was a substantialness unsurpassed by any other material while in homogeneousness it far excelled its competitors.

Throughout our state today we find many frame or wooden structures serving the school children. Do you know that by adding ten or fifteen per cent to the cost of many of these you could build of brick, thus securing greater safety. The clay materials may be had in nearly every community and under modern methods of making at very reasonable figures. In the valleys of the state during the summer months there is need for discretion in selection of material for the building of school houses. Again, brick resists better than other materials the passage of the heat from the outside and in winter it also resists better the cold from the outside. This feature may seem of minor importance, but it most assuredly has its place in studying out a building scheme, and should not be overlooked.

Structures for schools are usually of small height and therefore do not require steel frame, but the acme of present day construction is the frame of steel clothed in brick and ornamented in face brick and terra cotta.

To the San Franciscan there was the old Palace Hotel of brick structurally used which stood magnificently in 1906 and there is the present steel and brick structure of splendid design. This San Francisco monument exemplifies modern brick usage. Frequently in school building work there is necessity for change after construction and it is here brick walls serve the highest value. They being of unit construction may be altered with less cost and better workmanship. There is no need for lack of bonding of the work of non-continuity. To those who have had the experience of these changes the fact is a pertinent one of more value than at first thought. Taking a general view of the subject there is much to recommend the use of a material adapted by tests.

We are not experimenting when we build our school structures of brick and we are getting full value when we select a material having no equal for the work.

At this time in construction when many fads and fancies prevail we should place our confidence in a material of proved merit.

How to Make School Buildings Safe Without Being Built Entirely of Fire Proof Materials

Address given by J. A. Fouilhoux, before the Oregon Civic League at Multnomah Hotel, Saturday, May 16, 1914.

Safety results from careful thought and thoughtful care.

From a study of past disasters we can ascertain the causes of spread of fire and the causes of loss of life and draw from this study a few rules, which, if followed, will help us to obtain safe buildings.

The most serious of school fires in late years has been the one that occurred in Collinwood, Ohio, in March, 1908. In this fire 173 children and two teachers were burned to death. The Russell Sage Foundation which had made an investigation of the causes of the fire and of the conditions that led to the loss of life, gives us the following report:

"The Collinwood school was of brick, with wooden floors and partitions. Doors were double and to left of stairway. They should have been single and directly opposite stairway. Storage closets stood under stairs. Heating apparatus was defective, and cellar was not fireproof. Upstairs wardrobes opened directly into hall, removed from teachers' control. At opposite side of building were open wooden stairs.

"There was no automatic fire alarm, and no signal connection with fire headquarters. Fire was discovered

by a passerby and word sent to local authorities by telephone."

I shall endeavor to take up each point of this report and to show you how our proposed school building ordinance has been framed so as to overcome any defects brought to light in this report.

The walls of school buildings two stories in height are required to be built of masonry, that is either concrete, tile or brick. Such a wall would naturally be fireproof, but the danger would come from the furring.

While from the standpoint of the fire engineer wood furring should not be employed, the difficulty of securing dampproof solid walls, when the plastering is applied directly to the outer masonry wall, and the cost of metal furrings or tile lining, leaves wood furring as the only method for the architect under the appropriation. Wood furrings should be stopped off by plaster at the floor and ceiling and midway between. Even metal furrings should be fire stopped to prevent the spread of fire by draughts or superheated air or flaming gases.

The proposed ordinance calls for the stopping of wood furring by solid plaster at the floor and ceiling level and half way between.

In addition to the exterior wall, division masonry walls will be required so as to divide the floor space into areas of 5,500 square feet or less, thus avoiding the spreading of fire over a large area.

The Collinwood school had wooden floors throughout. Inasmuch as a very large percentage of fires start in the basements of buildings, our proposed ordinance provides for the construction of the first floor to be of strictly fireproof construction. The most dangerous part of the basement from a fire hazard point of view being the boiler or furnace and the janitor or supply room where rubbish, oil, etc., are kept. These rooms will have to be enclosed in eight-inch brick walls and the doors between these rooms and the building are required to be self-closing metal-protected doors. These requirements as to first floor construction and enclosure of boiler and janitor rooms having eliminated a very large percentage of the fire hazard in buildings, it seems reasonable to allow the floor construction above the first floor to be of wood. In order to minimize the fire risk in such a construction it is required to use heavy joists and solid bridging to prevent the quick spread

(Continued on page 119.)

Polytechnic High School

The group of buildings comprising the Polytechnic High School, conceived to meet the ideas and demands of the more liberal education of the present day, has incorporated in its scheme all the elements that make perfect such an institution. Situated in the path of the city's new growth, it is well prepared to care for, to educate, and to train the mind and hand of the new generations that shall grow up about it.

The site of the buildings is of an area 275 feet by 500 feet. The facade of the main building, 350 feet in length, faces Frederick Street, a boundary of the Golden Gate Park. This building, of northern exposure, containing the academic departments, faces the shop buildings in the rear which have their frontage on Carl Street. Space at either end of the academic building allows of adequate general entrances at these points to the school proper, or to the yards and shops behind. Besides the central and main entrance to the building, minor entrances are placed elsewhere leading directly to the basement floor. The yard area is so disposed as to accommodate and segregate the boys and girls, at the same time forming a logical separation between the respective academic and shop units, and yet binding them administratively as one.

The exterior aspect of the group exemplifies their functions; the principal building, of brick and terra cotta, is typical of the large school building; a symmetrical arrangement of large openings to provide adequate light, coincidently meeting the architectural considerations of mass and proportion. The central entrance is enriched with simple architectural features and embellishments which contrast with and accentuate the simplicity, quietness and dignity of the general structure. The shops in the rear, of reinforced concrete, in their work-a-day appearance bespeak their use.

The general plan of the academic school building naturally places the greatest number of class rooms on the northern frontage, with the southern frontage confined to toilet accommodations, stairways, elevators (future), and rooms of lesser importance, and a wide hall lighted at each end, running the entire length of the building. The main stairway, beginning at the main entrance, forms a stair hall throughout the four floors, while two minor stairways symmetrically placed, complete the vertical circulation of the scheme. The position of stairways, the general circulation, toilets, locker rooms, study halls, etc., conveniently and naturally divide the building into two parts for a separation of the sexes, and yet allows the assembling of the students for purposes of meeting and instruction.

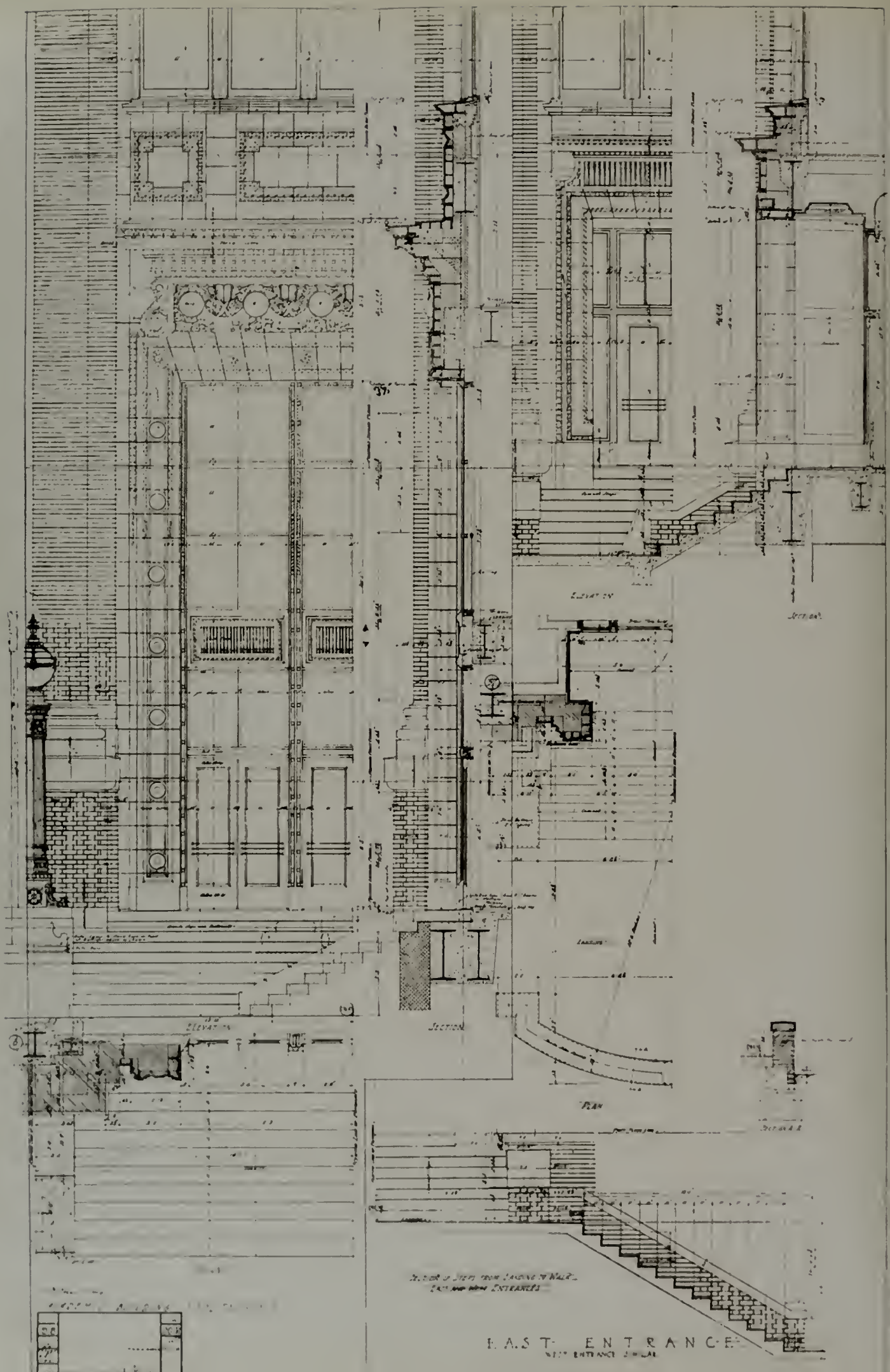
The basement is provided with a gymnasium, shower rooms and their accessories, lunch rooms and recreation rooms for boys and girls, besides which general space for the heating and other mechanical appurtenances is liberally allowed.

The first and main floor, which is half a story above the sidewalk, contains the auditorium, large enough, including the capacity of the balcony at the second floor, to seat the entire student body of 1500. The general entrances to this room are directly opposite the main entrance to the building, placed with the assumption that the auditorium will be used publicly and at times when the building proper is closed for school purposes; a large stage and its accommodations of ante-rooms, storerooms, etc., should do much to encourage and bring about the desired and greatly discussed neighborhood assemblies which should cause the school to become a part of the life of the parents as well as that of the children. The administrative offices are placed in proximity to the general entrance, and lecture rooms and laboratories complete this floor.

The second and third floors are typical, containing recitation and study rooms. The fourth floor provides class rooms for cooking, sewing, millinery, modeling, wood carving, arts and crafts, all of which rooms are lighted from above.

As a whole, the group, the academic building and the shop buildings behind, seem adequately provided for the needs of the present, and should meet the demands of growth and development of the future. The Polytechnic High School represents a great step forward in the advancement of such edifices, embodying ideas gathered through new thought and from much study of existing institutions of its kind.

Polytechnic High School, San Francisco
Plans prepared by the Bureau of Architecture, Board of Public Works



Detail of Entrances Polytechnic High School, San Francisco

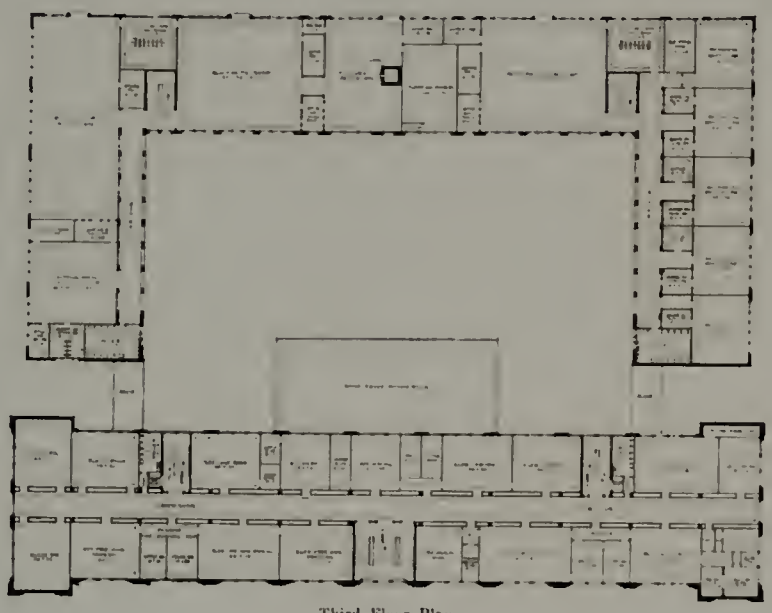
THE PACIFIC COAST ARCHITECT
September, 1914

Main Entrance

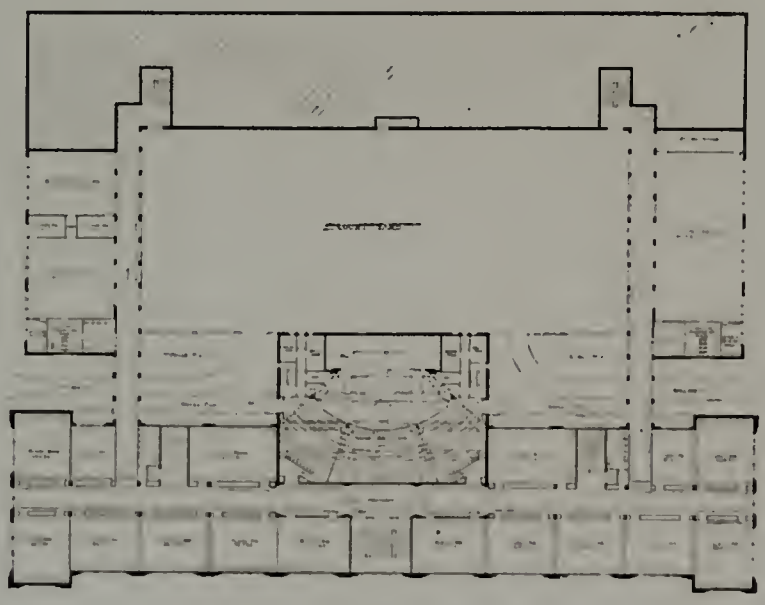
Corner View

Polytechnic High School, San Francisco

Fourth Floor Plan

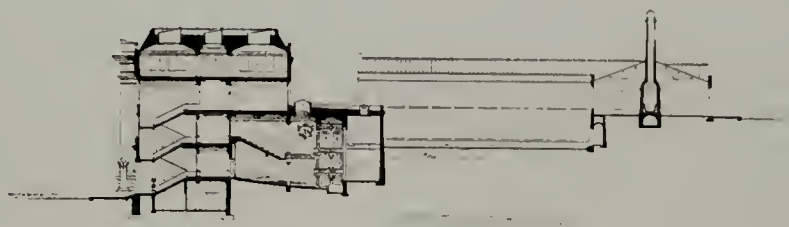


Third Floor Plan

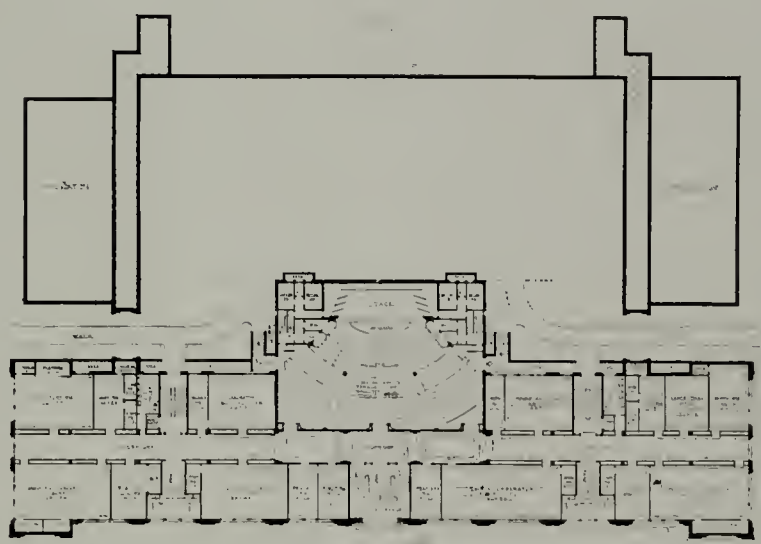


Second Floor Plan

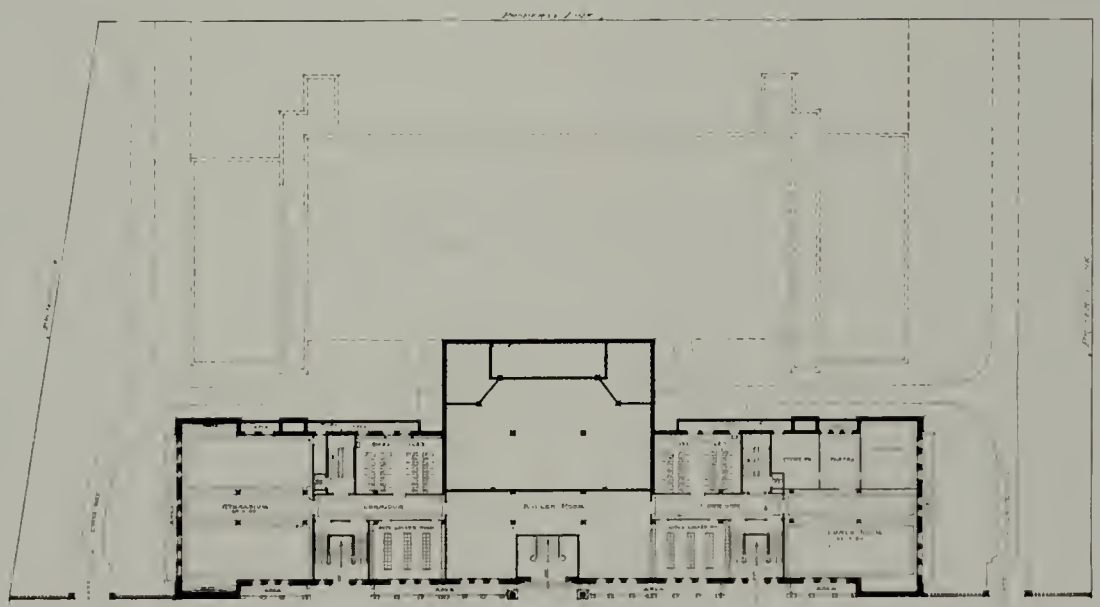
Polytechnic High School, San Francisco



Cross Section



First Floor Plan



Basement Floor Plan

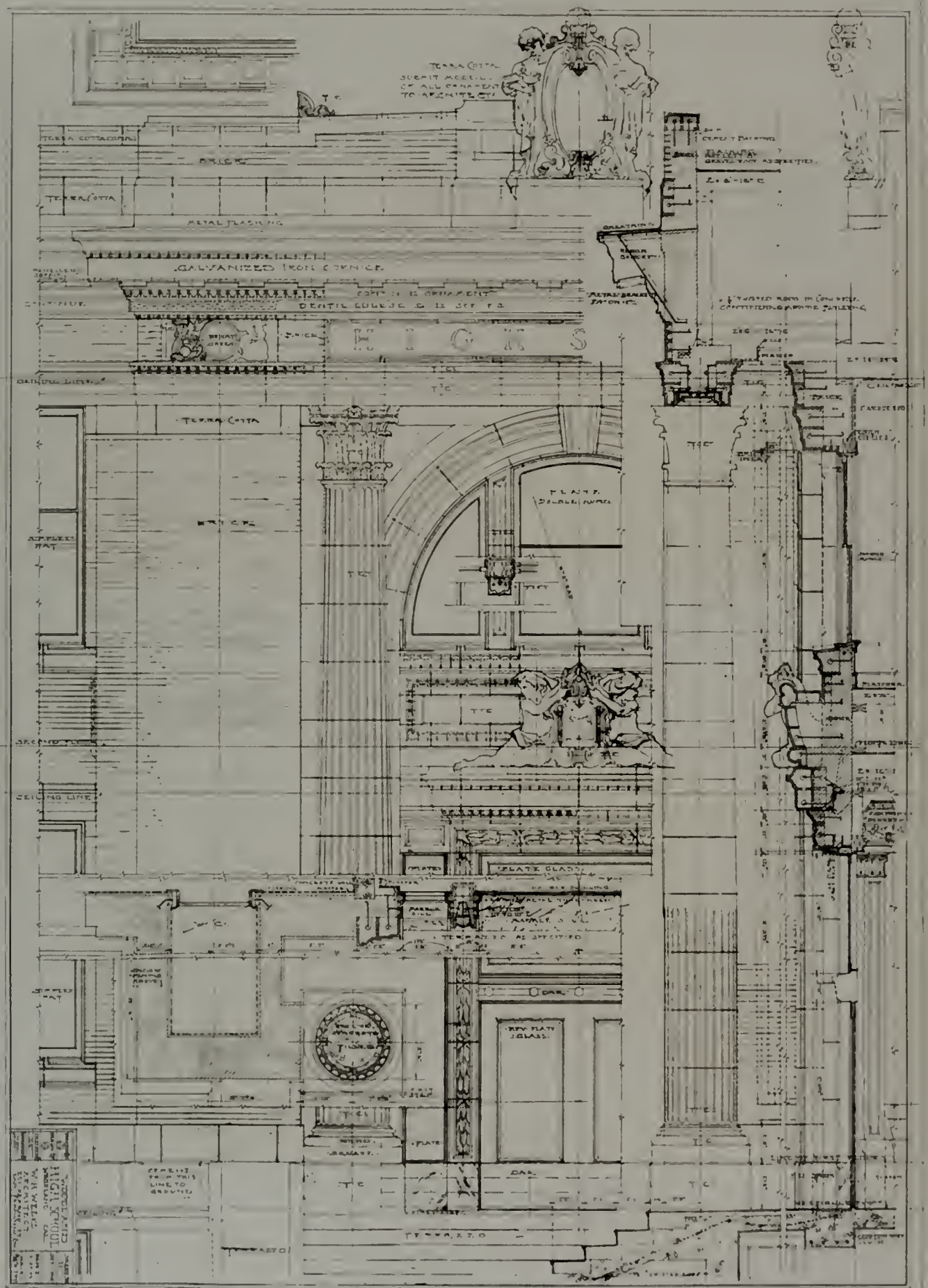
Polytechnic High School, San Francisco

Main Entrance

Corner View

High School, Woodland, California
W. H. Weeks, Architect, San Francisco

High School, Woodland, California
W. H. Weeks, Architect, San Francisco



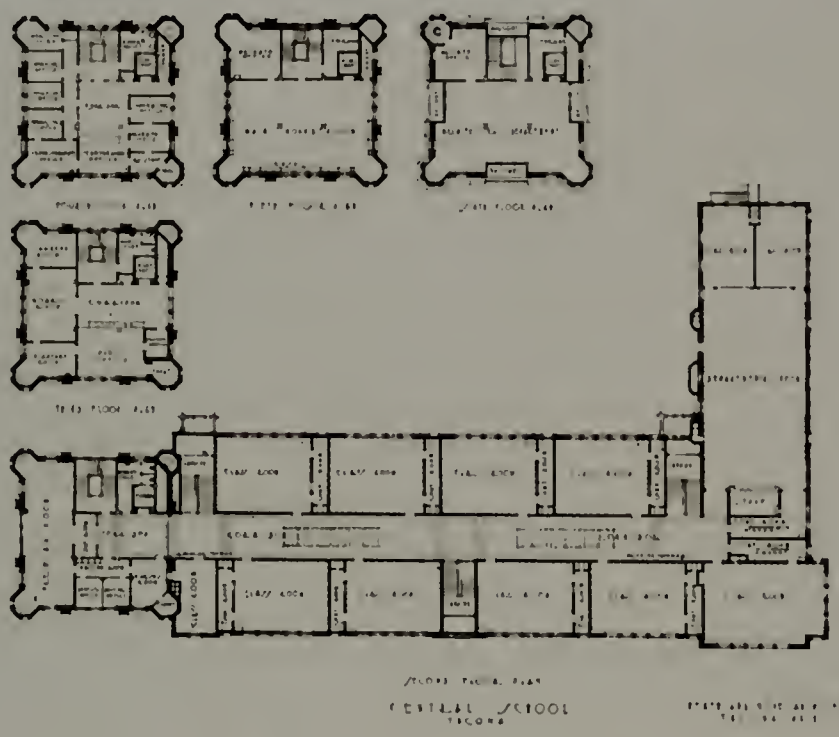
THE PACIFIC COAST ARCHITECT
September, 1914

Detail Main Entrance, Woodland High School
W. H. Weeks, Architect, San Francisco

Scale ¼" to the 1'-0"

Gilroy High School, Gilroy, California
W. H. Weeks, Architect, San Francisco

Lakeview School, Oakland, California
J. J. Donovan, Supervising Architect



Entrance to Offices Board of Education
Central High School Building, Tacoma, Washington
Heath & Gove, Architects, Tacoma, Washington

Central School, Tacoma, Washington
Heath & Gove, Architects, Tacoma, Washington

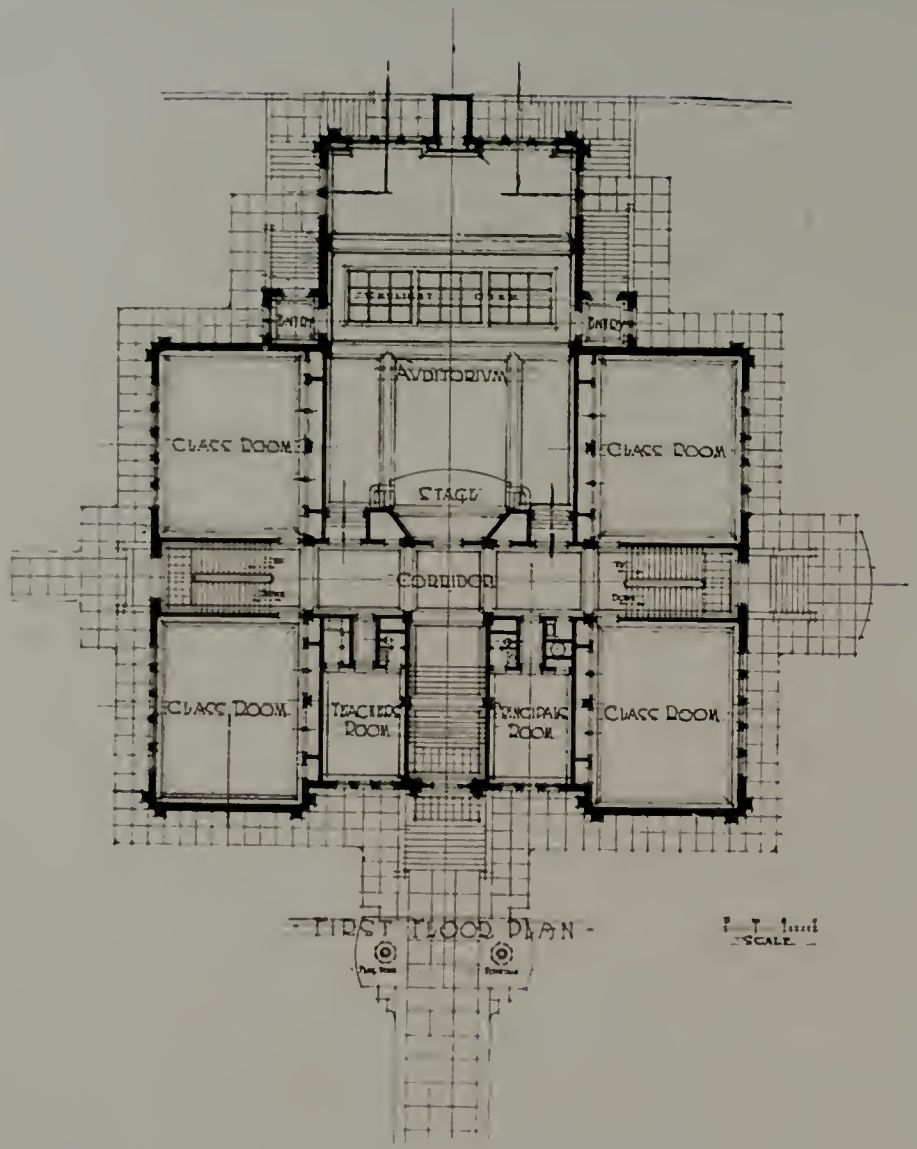
Rear View Ainsworth School, Portland, Oregon

Typical Class Room

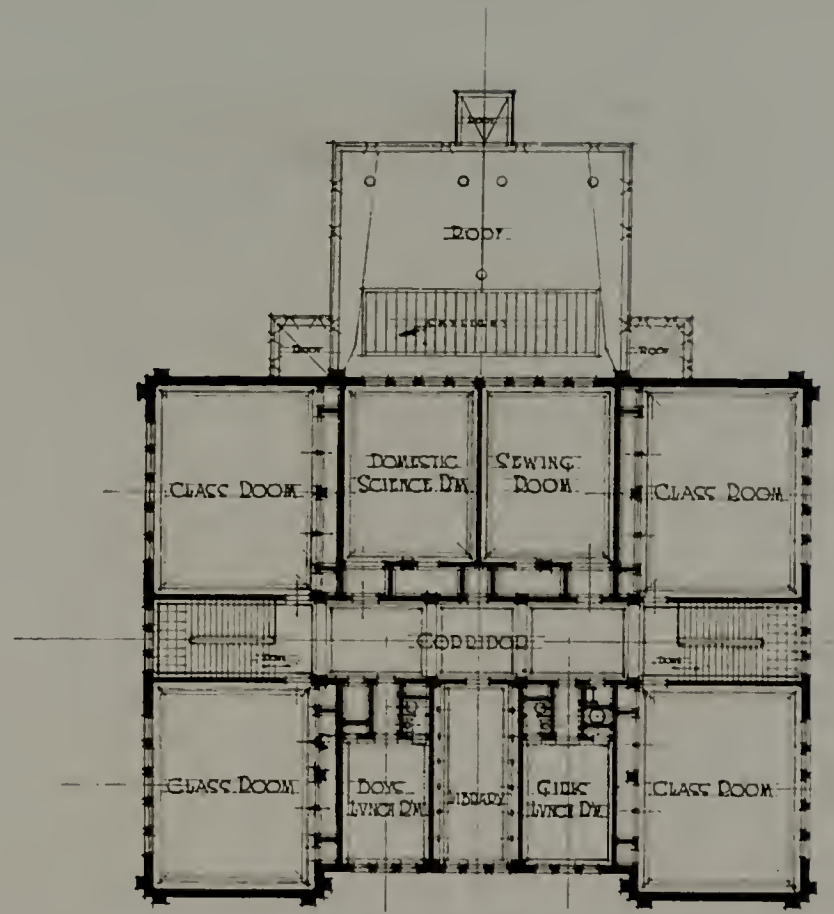
View of Main Corridor

Ainsworth School, Portland, Oregon
I. V. Nalamore, Architect, Portland, Oregon

Ainsworth School, Portland, Oregon
F. A. Naramore, Architect, Portland, Oregon



FIRST FLOOR PLAN

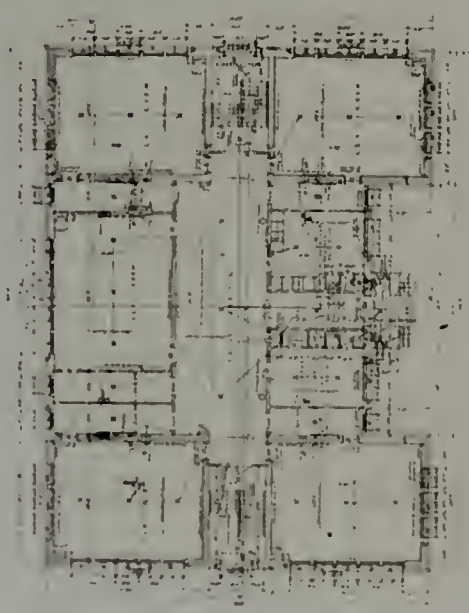


SECOND FLOOR PLAN

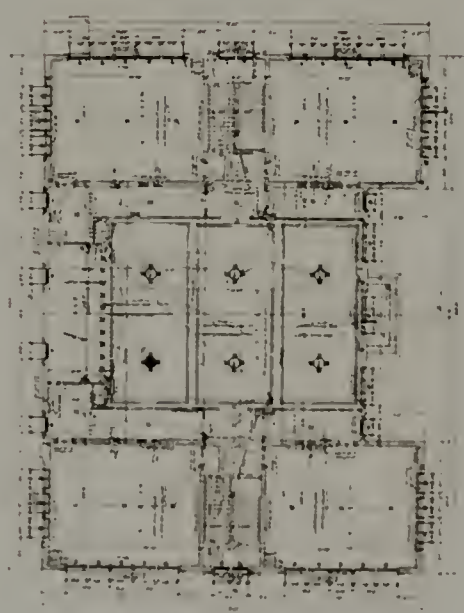
Ainsworth School, Portland, Oregon
F. A. Naramore, Architect, Portland, Oregon

The Franklin School, Bakersfield, California
Orville L. Clark, Architect, Bakersfield, California

View Main Entrance



First Floor Plan

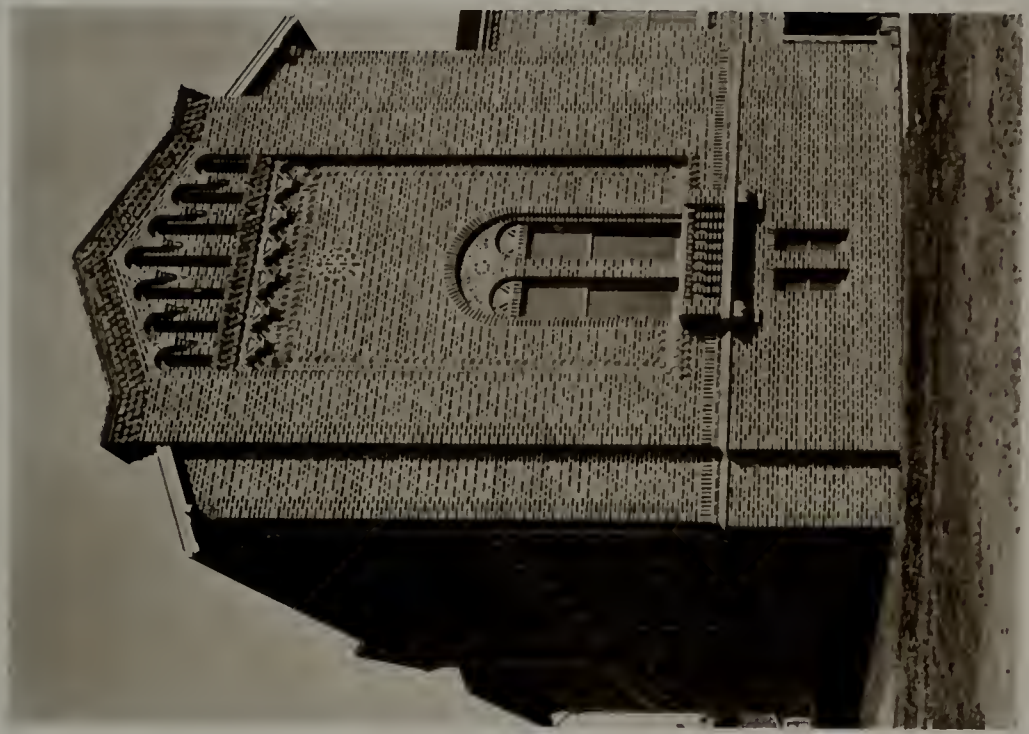


Second Floor Plan

The Franklin School, Bakersfield, California
Orville L. Clark, Architect, Bakersfield, California

Newburg High School, Newburg, Oregon
E. E. McClaran, Architect, Portland, Oregon

Malabar Street School, Los Angeles, California
Withey & Davis, Architects, Los Angeles, California



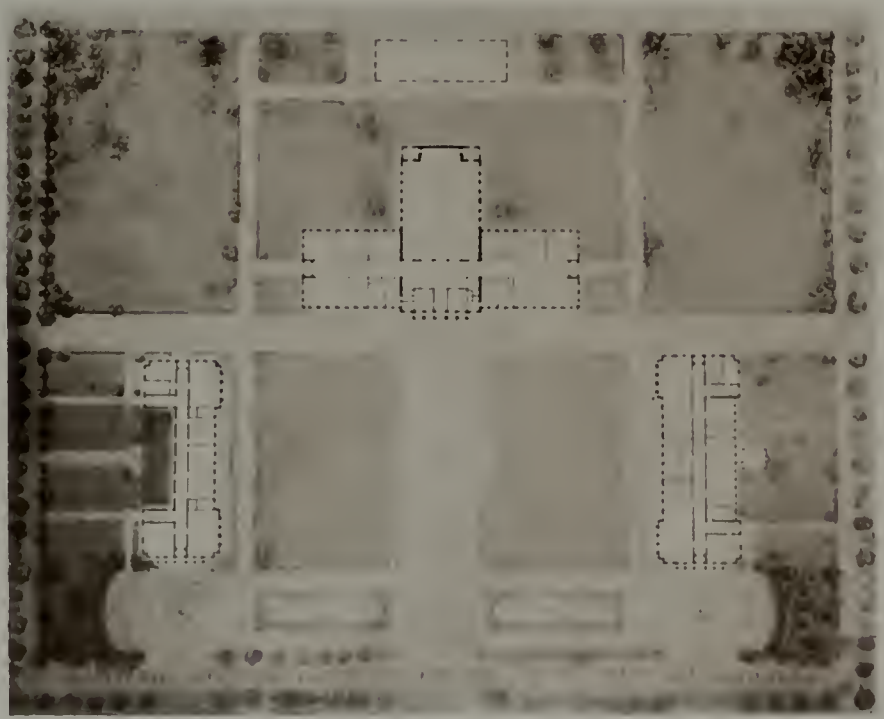
Corner Detail Malabar Street School, Los Angeles, California
Withey & Davis, Architects, Los Angeles, California

Malabar Street School, Los Angeles, California
Withey & Davis, Architects, Los Angeles, California

Santa Ana Polytechnic High School

Manual Arts Building, Polytechnic High School, Santa Ana, California
Withey & Davis, Architects, Los Angeles, California

Manual Arts and Administration Buildings, Polytechnic High School, Santa Ana, California



Ground and Floor Plans Polytechnic High School, Santa Ana, California
Wolfey & Davis, Architects, Los Angeles, California

"THE PACIFIC COAST ARCHITECT" is the official organ of the San Francisco Chapter of the American Institute of Architects.

San Francisco Chapter, 1881—President, G. B. McDougall, Russ Building, San Francisco, Cal. Secretary, Sylvain Schnaittacher, First National Bank Building, San Francisco, Cal.
Chairman of Committee on Public Information, William Mooser, Nevada Bank Building.
Chairman of Committee on Competition, Geo. B. McDougall, 235 Montgomery St.
Date of Meetings, third Thursday of every month; annual, October.

OTHER PACIFIC COAST CHAPTERS OF THE AMERICAN INSTITUTE OF ARCHITECTS.

Southern California Chapter, 1894—Vice-President, A. C. Martin, 430 Higgins Bldg., Los Angeles, Cal. Secretary, Fernand Parmentier, Byrne Building, Los Angeles, Cal.
Chairman of Committee on Information, W. C. Pennell, Wright & Callender Bldg., Los Angeles.
Date of Meetings, second Tuesday (except July and August), (Los Angeles).

Oregon Chapter, 1911—President, Morris H. Whitehouse, Wilcox Building, Portland, Ore.
Secretary, Ellis F. Lawrence, Chamber of Commerce Building, Portland, Ore.
Chairman of Committee on Public Information, Ellis F. Lawrence.
Date of Meetings, third Thursday of every month, (Portland); annual, October.

Washington State Chapter, 1894—President, James Stephen, 726 New York Block, Seattle, Wash. Secretary, Arthur L. Loveless, 513 Colman Building, Seattle.
Chairman of Committee on Public Information, Chas. H. Alden, 513 Colman Bldg., Seattle (till further notice send all communications to Arthur L. Loveless, 513 Colman Building, Seattle.)
Date of Meetings, first Wednesday (except July, August and September), (at Seattle except one in spring at Tacoma); annual, November.

Colorado Chapter, 1892—President, Geeorge H. Williamson, 528 Majestic Bldg., Denver, Colo. Secretary, Arthur A. Fisher, 459 Railway Exchange Building, Denver, Colo.
Chairman of Committee on Public Information, Arthur A. Fisher, 459 Railway Exchange Bldg., Denver, Colo.
Date of Meetings, first Monday of every month (Denver, Colo.); annual, September.

THE AMERICAN INSTITUTE OF ARCHITECTS.
The Octagon, Washington, D. C.

OFFICERS FOR 1914.

President .....R. Clipston Sturgis, Boston, Mass.
First Vice-President .....Thomas R. Kimbal, Omaha, Neb.
Second Vice-President .....Frank C. Baldwin, Washington, D. C.
Secretary .....D. Knickerbacker Boyd, Philadelphia, Pa.
Treasurer .....John L. Mauran, St. Louis, Mo.

BOARD OF DIRECTORS

For One Year

Irving K. Pond, Steinway Hall, Chicago, Ill.
John M. Donaldson, Penobscot Building, Detroit, Mich.
Edward A. Crane, 1012 Walnut St., Philadelphia, Pa.

For Two Years

Burt L. Fenner, 160 Fifth Ave., New York, N. Y.
C. Grant LaFarge, 25 Madison Sq., N., New York, N. Y.
H. Van Buren Magonigle, 7 West 38th St., New York, N. Y.

For Three Years

Octavius Morgan, 1126 Van Nuys Bldg., Los Angeles, Cal.
W. R. B. Willcox, Central Bldg., Seattle, Wash.
Walter Cook, New York, N. Y.

Auditors

Thomas J. D. Fuller, 806 Seventeenth St., Washington, D. C
Robert Stead, 906 F Street, Washington, D. C.

SAN FRANCISCO CHAPTER, A. I. A.

The regular monthly meeting of the San Francisco Chapter of the American Institute of Architects was held at the room of the Chapter, 110 Lick Building, on Thursday afternoon, August 20th, 1914. The meeting was called to order at 3:20 p. m. by Mr. Geo. B. McDougall.

MINUTES.

The minutes of the regular meeting of June 18th and July 16th, 1914, were read and approved.

STANDING COMMITTEES.

Board of Directors:
The Board of Directors submitted a report recommending that seven members be dropped from Chapter membership for non-payment of dues.

Sub-Committee on Competitions, A. I. A.:
Mr. Mooser, for the Sub-Committee on Competitions, A. I. A., wished to make a correction in the report of the committee submitted at the June meeting, stating that the unintentional inclusion of the name of Arthur Brown as a member of the Jury for the Webber Memorial, was a mistake.

Sub-Committee on Public Information:
Mr. Mooser, for this committee, had nothing to report, with the exception of the fact that members of the Chapter who had subscribed to the Journal would receive it at the old price through the current year, but that after that time the subscription rate would be $3.50 per annum.

Legislative Committee:
Owing to the absence of Mr. Mathews there was no report.

Building Laws Committee:
No report.

Educational Committee on Practice:
This committee reported that a talk by Mr. R. E. Smith on Illumination would be given at the conclusion of the business meeting in September.

Architectural League and Education:
The Secretary reported some correspondence with Mr. Gould, regarding the matter of the League. The correspondence would be read later.

Quantity Surveying Committee:
Mr. Wright, for this committee, made a verbal report, stating that he had been advised that the Boston Board of Education had decided that the taking of bids for the next school house be conducted under the Quantity System. Also that in Wilmington, Delaware, two municipal buildings had been let under the system.

Other Standing Committees:
No reports.

SPECIAL COMMITTEES.

Committee on the Revision of the Constitution and By-Laws:
No report.

Committee on Institute Journal:
Reported progress.

MEMBERSHIP.

Messrs. Edward Glass of Fresno, Benjamin S. Hirschfeld of San Francisco and Joseph L. Roberts of Porterville, having made the necessary applications for Chapter membership, and having been balloted upon, Messrs. Joseph and O'Brien were appointed tellers to count the ballots. Forty ballots were received and counted, and the gentlemen named were declared duly elected to Chapter membership.

On motion duly made, seconded and carried, the resignation of Mr. Albert Sutton was accepted with regret.

COMMUNICATIONS.

The following communications were received, and ordered placed on file:

Communication from Mr. Elmer Grey, of the Institute Committee on Town Planning, in reference to the same; from Mr. C. Williamson, chairman of the Cemetery Removal Committee of the Civic League of Improvements Clubs, relative to the reasons for the removing of dilapidated and neglected cemeteries in the Western Addition; and letter of resignation from Mr. Albert Sutton. Copies of the Pacific Coast Architect for July and August; letter from Carl F. Gould, president of the Architectural League of the Pacific Coast *in re* the A. L. P. C. Convention to be held in Seattle in October; and the minutes of the Michigan Chapter, A. I. A., of the regular meeting.

UNFINISHED BUSINESS.

There was no unfinished business.

NEW BUSINESS.

On motion duly made, seconded and carried, the names of the seven members recommended by the Board of Directors, were dropped from Chapter membership for delinquency.

On motion duly made, seconded and carried, the chairman of the Legislative Committee was notified to have his committee prepare for the next meeting of the Legislature.

In the matter of the Architectural League of the Pacific Coast, after some discussion, the Secretary was directed to send in the resignation of this Chapter from the League.

The communication from Mr. Elmer Grey on Town Planning was referred to the Housing Committee for action and report.

A written statement prepared by Mr. Thos. J. Welsh as to certain conditions affecting the profession was read, and ordered received and placed on file.

On motion duly made, seconded and carried, the Chair was empowered to appoint a Special Committee to gather data concerning the matters mentioned in Mr. Welsh's report.

The Chair announced, with deep regret, that since the last meeting the Chapter had sustained a severe loss through death, of its former President, Mr. Albert Pissis. Also that Mr. David Farquharson, an honorary member of the Chapter, had passed away. The Secretary was directed to send suitable letters of sympathy and condolence expressing the regret of the Chapter.

ADJOURNMENT.

There being no further business before the Chapter, adjournment was taken at 4:45 p. m., out of respect to the memory of our late brethren. Subject to approval,

SYLVAIN SCHNAITTACHER,
Secretary.

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SOUTHERN CALIFORNIA CHAPTER, A. I. A.

The seventy-fourth meeting of the Southern California Chapter of the American Institute of Architects was held at the Hollenbeck Cafe, Los Angeles, California, on Tuesday, July 14th, 1914.

The meeting was called to order at 7:50 p. m. by Vice-President A. C. Martin. The following members were present:

1. D. C. Allison,
2. J. C. Austin,
3. J. J. Backus,
4. A. B. Benton,
5. J. J. Blick,
6. W. E. Erkes,
7. Homer H. Glidden,
8. J. W. Krause,
9. John P. Krempel,
10. A. C. Martin,
11. H. H. Martin,
12. O. W. Morgan,
13. Octavius Morgan,
14. S. Tilden Norton,
15. Robert H. Orr,
16. H. M. Patterson,
17. T. F. Powers,
18. A. F. Rosenheim,
19. J. T. Vawter,
20. August Wackerbarth,
21. A. R. Walker,
22. H. F. Withey,
23. F. A. Shafer.

As guests of the Chapter were present: Charles Gordon, Alfred W. Ray and Arthur S. Heineman, local architects; Harry Iles and W. Dellamore, of the Builder and Contractor, and W. E. Prine, of the Southwest Contractor.

The minutes of the seventy-third meeting of members were read and approved.

For the Board of Directors the Secretary reported that one meeting had been held on Wednesday, July 8th, 1914. At this meeting of the Directors letter ballots for recommendation to fellowship were opened, and the Secretary instructed to forward the result to the Institute headquarters.

The Secretary further reported that Fernand Parmentier had been granted three months leave of absence, and that A. R. Walker had been appointed Acting Secretary during his absence.

Upon motion of Mr. A. F. Rosenheim, seconded by Mr. Homer Glidden, the action of the Board in granting this leave of absence was unanimously ratified by the Chapter.

For the Committee on Civic Improvement, Mr. John C. Austin reported that the Chapter's committee had been actively at work in their affiliated capacity with the Los Angeles City Planning Association, and that from the point of view of this Association much interest in this work seemed to be manifested by all members. Mr. Austin further reported that the work of this Association looking toward the appointment by the City Council of an active City Planning Commission would be realized.

For the Committee on Institute Membership, Mr. H. M. Patterson reported that the committee was encouraged by the probable securing of additional Institute members.

For the Committee on Quantity Survey, Mr. Octavius Morgan, Jr., reported that the committee had held no further meetings since the last Chapter meeting, but that the various members of this Committee were making themselves thoroughly familiar with this subject and that their report would have to be deferred until a future meeting.

Mr. John P. Krempel reported for the Special Committee on "A. B. C." Picnic, that approximately twenty-five architects attended this picnic and that a most enjoyable afternoon had been spent.

For the Standing Committee on Membership, Mr. Julius Krause reported that one application would be presented to the Board of Directors at their next meeting and that other candidates were in prospect.

For the Committee on Education, Mr. John C. Austin read a letter addressed to that committee from Mr. Scott Quintin, Instructor of the Architectural course at the Los Angeles Manual Arts High School. In this communication a request was made for an opinion on a program proposed for this course during the coming term.

After considerable discussion on the subject, Mr. John P. Krempel moved that the matter be left in the hands of the committee to be replied to in accordance with their best judgment. The motion carried.

Communications were next read as follows:

From D. Knickerbacker Boyd, Secretary of the A. I. A., calling the attention of the Chapter to matters of Institute importance and to actions taken by the Board of Directors, namely: First, the importance of holding a meeting for the purpose of discussing the question of Institute reorganization as recommended by the Committee on Chapters. Second, relative to the matter of co-operation by the Institute with the Department of Agriculture in the matter of housing and improvement to farm conditions, and requesting the Secretary to forward the result of the work done locally to the Secretary of the Institute. Third, relative to a resolution by the Board of Directors, expressing a desire to encourage the closest co-operation between Chapters and architectural societies and clubs in the territories contiguous to established Chapters, and the extension of any and all courtesies to such organizations.

From the Chamber of Mines and Oil, relative to certain materials available for its members. This communication, it was suggested, might be sent to the Tropico Tile Works as a possible matter of interest.

From the American Civic Association in acknowledgment of the receipt of letter of June 11th.

From the Secretary of the A. I. A., acknowledging the receipt of the Chapter's letter of June 11th, relative to the matter of collecting farm-house drawings and exhibits.

Under the head of new business the Secretary presented the subject matter of the evening, the question of Institute reorganization. After giving a clear outline of why the new policy seemed desirable and the reasons that led up to its initiation, the Secretary read the outline report as presented in the Journal of June, 1914. A general discussion followed this reading, whereupon the report was again read in sections, discussed and approved in all its sections with the following exceptions:

Relative to the payment of dues a suggestion was made by Mr. Tilden Norton that dues of both members and candidates be paid to the Institute and not to both Chapter and Institute; that the Chapters should be responsible for the proper payment of such dues to the Institute; the suggestion being made in an effort to do away with any notions on the part of members or of the public as to the existence of a dual organization. Previous to putting a motion on this matter, Mr. J. J. Backus moved, seconded by Fernand Parmentier, that the Chapter endorse the changes reported by the Committee on Chapters with the modifications to be hereinafter proposed.

Following the adoption of this motion, it was moved by Mr. Benton, seconded by Mr. Norton, that dues for Institute members and candidates be paid quarterly by the Chapter to the Institute. This motion was unanimously passed.

The question as to the uniformity of dues was next discussed.

A motion was made by Mr. John C. Austin, seconded by Mr. Parmentier, that the dues for candidates be made approximately 50 percent less than for members. A discussion followed and an amendment was offered by Mr. Norton that a reduction be made to candidates for the first year only, thereafter the dues to be uniform for both members and candidates. Upon the acceptance of this amendment by Mr. Austin and his seconder, the motion was so put and unanimously passed.

Relative to the question of examination and fee for membership, Mr. Krempel moved that in localities where State laws now exist requiring the certification of architects, that no such examination as noted in the committee's report be required. Following a discussion, this motion was carried.

Relative to the rights of candidates, it was moved by Mr. Backus, seconded by Mr. Norton, that members and candidates may have equal rights and power to vote in matters of local interest. This motion was adopted.

Relative to the status of the present junior members, it was suggested by Mr. Parmentier that present juniors, as well as Chapter members, automatically become candidates.

Relative to the election of honorary members, it was moved by Mr. Austin that such members be selected and voted upon by each local Chapter for the honorary members within that territory. No second being presented to this motion, the recommendation of the committee as presented in the report was approved.

Relative to the section on Associates of the Chapters, it was moved by Mr. Norton, seconded by Mr. Erkes, that such a form of membership should not, by this Chapter, be endorsed.

All other sections of the committee's report were endorsed.

Following the action of the Chapter on the report of the Committee on Chapters, a communication from the Building Committee of the Los Angeles City Board of Education was read relative to the awarding of certain school buildings to local architects.

Mr. Octavius Morgan, recently returned from an extensive European trip, next addressed the Chapter, reciting some of his interesting experiences of the trip, and touching upon his work as a Director of the Institute while in the East.

Mr. Martin opened a discussion on a proposed ordinance now before the Los Angeles City Council to do away with the use of the marquise on buildings. Mr. Backus reported that the matter was still before the council and that the course of their action was as yet not indicated. Mr. Arthur Heineman, a guest of the evening, was called upon and briefly stated the part he had taken in opposing the passage of this ordinance. Upon motion of Mr. Parmentier it was left in the hands of the Acting President to appoint a committee to deliberate upon the question and deal with the Los Angeles City Council in the matter to the best interests of the profession.

The meeting adjourned at 10:35 p. m. until the second Tuesday in October, or subject to the call of the Chairman.

(Signed) FERNAND PARMENTIER, Secy.
By A. R. Walker.

OREGON CHAPTER, A. I. A.

Meeting held at the University Club July 16, 1914, called to order by President Whitehouse. Wm. G. Holford appointed Secretary pro tem in the absence of Secretary Lawrence.

Those present were: Messrs. Whitehouse, Lazarus, Naramore, Fouilhoux, Johnson, Smith, Beckwith, Jacobberger, Holford and Doyle.

Mr. Beckwith moved and Mr. Doyle seconded that the minutes of the last meeting be accepted as printed. Motion carried.

REPORTS OF COMMITTEES.

Buildings Laws Committee by J. A. Fouilhoux.

Mr. E. F. Lawrence,
Sec. Oregon Chapter, A. I. A.,
Chamber of Commerce Bldg., City.

Dear Sir:

At a meeting held at the Commercial Club July 1st, the proposed Housing Code was discussed. I regret to state that although all the members of the Chapter had been requested to send their suggestions regarding the proposed Code, only four went to the trouble to do so and no members outside of the committee were present at the meeting. It is rather deplorable to see the lack of interest shown by the members of this Chapter in such an important question as the new Housing Code is. However, we have submitted to Commissioner Dieck a letter a copy of which we enclose herewith. The Housing Code will probably come up before the Council in the very near future. Respectfully submitted,

J. A. FOUILHOUX,
Building Laws Committee.

Mr. Robert G. Dieck,
Commissioner of Public Works,
City Hall, City.

Dear Sir:

The Oregon Chapter of the American Institute of Architects, after investigation of the proposed Housing Code, wishes to recommend its adoption by the City Commission. However, your attention is called to the following changes which we deem desirable:

Section 2. That the Bureau of Health be charged with the inspection of tenements and dwellings, it being their duty to report to the Bureau of Buildings any change or alteration required by the Building Department to be responsible for enforcement of these requirements.

Section 3. Provide a Board of Appeal consisting of five members appointed by the Mayor in the following manner: One member from two candidates nominated by the Realty Board, one member from two candidates by the Builders Exchange, one member from two candidates nominated by the Oregon Chapter, A. I. A., one member from two candidates nominated by a property owners or taxpayers organization, one member from two candidates nominated by public welfare organizations (Consumers League, People Institute, Associated Charities). The appointments first shall be made for the terms of one, two, three, four and five years respectively, so that the term of one member shall expire each year. All subsequent appointments shall be made for a term of five years. Vacancies shall be filled in the same manner in which original appointments are made. Each member shall serve without pay, and shall be a resident or engaged in business in Portland.

No member shall act in any case in which he is interested, and in any case any member is so disqualified, the remaining members shall designate a substitute.

Every decision of the board shall be in writing and shall require the assent of at least three members.

Sections 58, 59, 60 and 61 of the present Building Code to remain in force.

Section 5. Change second line to read as follows: "at any time to be altered so such alteration be in violation or render the building in violation of any provision."

Section 9. Eighth line, change the word "architect" to "builder." The architect coming under qualification of agent who is previously mentioned in this paragraph.

Section 10. To be changed so as to read as follows:

The inspector of buildings shall, during construction regularly inspect or cause to be inspected all buildings for the purpose of ascertaining that they are being constructed in conformity to the provisions of this ordinance of the City of Portland, and if any violation is found to exist, said inspector shall immediately order the owner or other persons in charge to proceed with such changes or alterations to make such buildings conform with said ordinance.

When notified by the owner or other persons in charge of the completion of the said building, he shall make inspection and examination of such building and issue a certificate that it has been found to be constructed in conformity to the provisions and ordinances of the City of Portland.

The unlawful occupation is covered by Section 11.

Section 14. Second line to read: "built in parts or units has been partially completed at this time."

Section 15. Omit word "architect" in second line, add "wilfully" before the word violates in the fourth line, omit the words "or violates" in the fifth and sixth lines.

Section 17 to read as follows:

No living room in apartments shall be allowed, the floor of which is below the level of the adjacent ground on any side of the room. This section should be made part of Section 51.

Section 25. Add the following sentences:

"The minimum width of a court for a tenement two stories in height or less shall be seven feet, and for a dwelling two stories in height or less shall be five feet and such width shall be increased one foot additional for each story above two stories. The minimum area of such courts shall be one hundred and thirty square feet for buildings two stories in height or less and such minimum area shall be increased forty square feet for each additional story above two stories."

Third line from end, change "such court" to "all courts."

Section 40. Fifth line to read as follows: "passageway not less than 21 square feet area with minimum dimensions of two feet."

Section 43. After second sentence add the following: "Provided that any apartment containing five rooms or over, one room may contain 80 square feet in area."

Section 44. Lines four and five to read as follows: "shall have a window or windows with a sash arrangement giving not less than 12 square feet free area." Lines 8, 9, 10 omit the following: "and such windows shall be made so as to open from the top the full width or from the side the full length."

We understand that this section to be amended so as to allow shaft ventilation for interior bathrooms.

Section 57. Should allow tenements five stories in height of VI class with metal lath protection throughout.

Section 59. Add the following: "stairs to roof or rear service stair treads may be nine inches."

Respectfully submitted,
J. A. FOUILHOUX,
Chairman Committee on Building Laws,
Oregon Chapter, A. I. A.

LEGISLATION.

Mr. Lazarus, recently appointed Chairman in place of Mr. Williams, resigned, reported his committee was awaiting instructions.

Mr. Johnson reported as Chairman of last year's Competition Committee, that he had written Mr. Rice (according to instructions received by Mr. Medary) in regard to Mr. Sutton's participation in the competition for the Oregon State Building at the Panama Exposition.

CONTRACT COMMITTEE

Reported progress and promised final report at the next meeting. Mr. Whitehouse reported he was unable to obtain an interview with Mr. Hohman of the County Commissioners in regard to Interstate Bridge and Columbia Highway Bridges.

READING OF COMMUNICATIONS.

Letter read from Mr. H. A. Whitney, tendering his resignation, referred to the meeting by the Executive Committee, was laid upon the table upon motion by Mr. Doyle and seconded by Mr. Beckwith, until the Secretary has heard from Mr. Whitaker. Secretary was instructed to request Mr. Whitaker to take up with Mr. Whitney direct the matter of Institute dues. In connection with this matter letters from Secretary to Mr. Whitney were read and from Mr. Whitaker.

Letter from Secretary Boyd notifying the Chapter concerning fellowship recommendation was read.

June 22, 1914.

To the Secretary of each Chapter.

Dear Sir: Permit me to call your attention to the last sentence in Section 1, Article 2, of the By Laws, which states that individual Chapters may make recommendation for advancement to Fellowship. If your Chapter has any such recommendation to make, please be good enough to see that they are sent to the Octagon not later than about September 15, in order that ample time may be allowed for consideration of the names submitted.

In the case of recommendation previously made but not presented by the Board of the Convention for advancement to Fellowship, please repeat at this time the names of any of those which you desire to have considered with the new list

Very truly yours,

D. KNICKERBACKER BOYD,
Secretary.

Mr. Lazarus moved and Mr. Fouilhoux seconded that the Secretary notify members by letter of the opportunity to recommend Associate members of the Chapter for advancement to Fellowship, and asks that each member designate whom he wishes to honor.

Mr. Doyle suggested each member should read for discussion at future meeting report of Committees on Chapters report in the June Journal.

Mr. Lazarus read from Builders Exchange communication and his reply, giving ideas as to strengthening the work of the Exchange

Mr. Fouilhoux moved and Mr Doyle seconded that the Municipal Affairs Committee take up the matter of bill boards along the Columbia Highway with County Commissioners in order that the natural beauty be not marred by signs, etc. Motion carried

Mr. Jacobberger moved and Mr. Naramore seconded that the Municipal Affairs Committee communicate with other interested organizations on this matter of bill boards along the Columbia Highway, asking for their co-operation to secure protection.

Mr. Doyle read report of Committee on Chapters in June Journal by request, and those present discussed it at some length.

Meeting adjourned. WM. G. HOLFORD,
Secretary pro tem

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WASHINGTON STATE CHAPTER, A. I. A.

As the Washington State Chapter, A. I. A., does not hold meetings during the months of July, August and September, there will be no minutes of meetings published until October, when they will be resumed.

A Pacific Coast Concern

Just sixty-three years ago in a small and unpretentious building at Sacramento two men began an humble paint business on a very limited scale. The two owners themselves formed the entire organization and labored indefatigably to crown their enterprise with success. And their efforts were not in vain.

The result as we see it today is the corporation of W. P. Fuller & Co., owning a string of sixteen stores from Spokane to San Diego, employing over one thousand men, and operating probably the most extensive factory on the Pacific Coast.

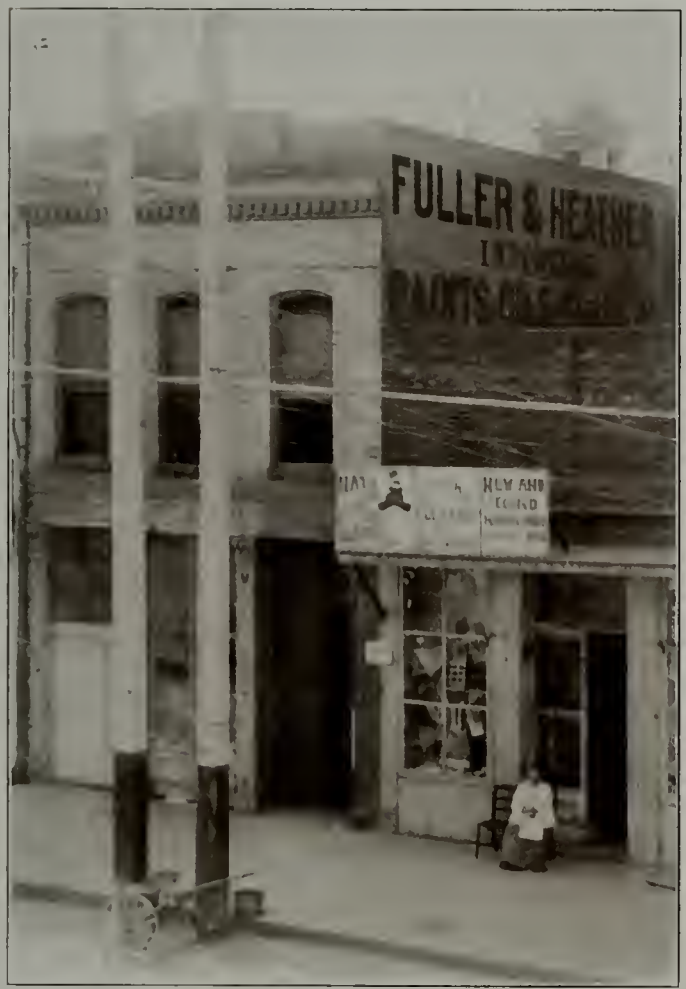
W. P. Fuller, Sr., came around the Horn in 1849, arriving in California early in 1850. One year later, Mr. Fuller, together with Mr. Heather, started in the paint business in Sacramento under the firm name of Fuller & Heather. Eleven years later, during the great flood of 1862, a large portion of the stock of the concern was moved to San Francisco, and henceforth this city was the base of operations. Mr. Heather retired in 1867, and the firm of Whittier, Fuller & Co. was then established. In 1890 Mr. Fuller died, and the partnership was continued by his son, W. P. Fuller, Jr. A few years later Mr. Whittier retired, and 1894 saw the incorporation of the firm of W. P. Fuller & Co.; it is under this name that the business has since been successfully carried on. When W. P. Fuller, Jr., retired in 1904, I. F. Littlefield became president and general manager, and his administration of affairs has been attended by continued prosperity and steady growth.

The huge factories of the firm are located in South San Francisco and occupy almost eighteen acres of ground. The plant includes a total of twenty-six buildings.

Factories of W. P. Fuller & Co., at South San Francisco.

W. P. Fuller & Co. originally began the manufacture of Mixed Paints and White Lead in 1875, these products previously having been imported from the East. Their Paints and Pioneer White Lead have now been made continuously for forty years and have achieved a wide and justly deserved reputation. One after another, the factory products have been increased until at this time are included, besides White Lead and a complete line of Mixed Paints for every use: Colors in Oil, Colors in Japan, Enamels, Stains, Wall Finishes, Distemper Colors, Varnishes and Shellacs, Red Lead and Litharge, Prepared Wax, Lubricating Oils, Putty and Mirrors.

The varnish factory, built in 1913, is a model, modern plant, and a like description will apply to the new Mixed Paint factory now in the course of erection. In-



The Birthplace of the Firm in Sacramento, 1851.

creased business has rendered the former quarters of the Paint department inadequate.

From the first the watchword of the Fuller factory has been—"Quality." The quality of their goods is reflected in the success of their business.

The main store and general offices of the firm are located in San Francisco. Besides the branch at Sacramento, the company operates distributing houses at Oakland, Stockton, Long Beach, Pasadena, Santa Monica, San Diego, Seattle, Tacoma, Spokane, Boise, two at Portland and two at Los Angeles.

W. P. Fuller & Co. has reason to be proud of the length of service of many of its employees. One man has been recently pensioned after 45 years of service, and at least twenty others have passed the 30-year mark.

The firm owes its prosperity in large part to the strong foundation on which it was built in its early years, a foundation for which W. P. Fuller, Sr., is responsible. Mr. Fuller was one of the old-time business men, doing business not only on the lines of strict honesty, as the word is understood nowadays, but on the stricter usages of the old-time merchant; absolutely taking no advantage of anyone and allowing no advantage to be taken for his benefit by any of his employees. He was a man of sterling character, charitable and honorable in all his dealings, far-seeing and broad-minded, and attended strictly to the one line of business in which he was engaged, indulging in no speculations, taking pride in his business and its growth, and an honest and hearty interest in the welfare of his employees and fellow citizens. The aims and practices of the founder have been carried out by his successors—his sons—and the same honest policy has been followed at all times. Mr. W. P. Fuller, Sr., started with no capital except his brains, integrity and honesty, and his fortune was thus built up without any of the latter-day methods.

W. P. Fuller & Co. is essentially a Pacific Coast concern and a firm believer in the motto: "Western made for Western trade."

The Main Store and General Offices of the Company, Beale and Mission Streets, San Francisco.

Light and Ventilation of School Rooms

In planning and designing a habitation, be it a home, hotel, office building, school, or other edifice where people dwell, congregate and have their abode, either singly or collectively, how essential and important it is for the architect and designer to carefully consider and incorporate all of the requirements and essential features demanded in a building of this character. To secure protection and shelter from inclement weather and at the same time so design the structure that it will contribute to the occupants' health, comfort and convenience and be suitable for their particular vocation and pursuits, is an achievement requiring thought, study and persistent effort on the part of the architect.

Emerson School, Oakland, California. John Galen Howard, Architect, San Francisco

To obtain perfect results it is necessary to incorporate the latest and best products and improvements that can be obtained. Careful consideration should be given to the different products manufactured for this purpose. One of the most essential features to consider in designing are the windows. They are required to contribute light, air, sunshine and ventilation, without which a building would not be habitable. How necessary and important it is then to select windows that will in the most suitable and efficient manner supply your structure with these vital and necessary features. With this object in view, we call the reader's attention to the above illustration in school work, showing windows which are in adaptability and durability the last word and most perfect achievement. The operation and movement of these windows are secured without the use of weights to counterbalance them. They operate wholly outside and when open assume a tilting position. This position can be adjusted to any desired angle, even to the full reversal of sashes for cleaning. Owing to the tilted position of sashes when open the maximum amount of air is secured and forced upward and inwardly into interior, where it distributes itself throughout the room in draftless circulation, at the same time eliminating the foul and exhausted air and carbon-dioxide which accumulates at floor line. This is accomplished by having windows extending down to or within six inches of floor. These windows for school purposes are usually made three sash openings and give an abundance of air and light to

Typical Interior View of Class Rooms, Oakland Schools. J. J. Donovan, Architect, Oakland, California

scholars who, owing to this fact, are healthier, brighter and more energetic and have a much greater capacity and inclination to study and develop their mentality.

In California alone some two hundred school buildings have been equipped with these unrivaled windows, and a great number are now specified and in use in other states. They have been installed and are now in use in all kinds and classes of buildings, including fireproof structures. Owing to their sterling qualifications in giving light, air and perfect ventilation, a school building so equipped does not need any other system of ventilation, which is a great saving. They have proven themselves to be absolutely weather-proof, and are noiseless in either an open or closed position.

These windows have given splendid results wherever used, and the public is invited to investigate and examine closely their merits. The manufacturer of these unrivaled windows is The Simplex Window Company, 525 Market Street, San Francisco, and have agencies throughout the world. On request they will send all necessary data and information, including details, descriptive booklet, prices, etc., and will answer promptly all communications addressed to them.

How to Make School Rooms Safe Without Being Built Entirely of Fire Proof Material

(Continued from page 92.)

of fire. As an additional precaution all the ceiling, walls and partition surfaces shall be protected with plaster on metal lath.

One great source of danger in buildings is the defective electrical wiring, such wiring, according to the proposed ordinance should be run in conduit, which practically eliminates any fire risk from this source.

The report on the Collinwood fire states that the doors were to the left of the stairway. All exit doors should be directly opposite the stairway and swing in the direction of the outgoing passage; they should have an approved type of horizontal push-bar device that will unlock the bolts by pressure against the bar. These bars should extend the full width of each door.

Some authorities have omitted all locks on class room doors. There is much in favor of this method, wherever it is not necessary to secure rooms against misdemeanants. All locks to school rooms, closets and exit doors should be those that cannot be locked against outgoing persons.

The proposed ordinance gives a minimum width of doors to be used in connection with exits, also a maximum size of a single door or leaf of double door, so that a small child can always push the same open. The doors are required to swing outwards.

Regarding the storage closets under stairs these will be prohibited under a general provision of the building ordinance of this city.

The Collinwood school heating apparatus was defective. I have shown previously how the construction of the first floor and the special protection around the boiler room should prevent a fire from spreading from the boiler room to the rest of the building. The general provisions of the ordinance also require metal sleeves around steam pipes and the provision governing the distance between hot air ducts and wood and the protection of these ducts should be an additional guarantee against a fire from heating apparatus in our school buildings.

In the Collinwood school the upstairs wardrobes or cloak rooms opened directly into the hall and were removed from the teachers' control; this led to confusion and panic, inasmuch as the pupils did not march out in order through the customary door. The ordinance prohibits the use of more than one door in a classroom and this door is to be near the teacher.

The Russell Sage Foundation report shows that at opposite sides of the Collinwood school building were open wooden stairs. The question of stairs is one of the most important in the planning of a building. In panics people try to escape by the exits they commonly use. Properly built stairs make the best fire escape. Staircases should always be in plain view and the architectural treatment of the corridor at stair points should be such as to suggest the way of exit. All stairways should discharge directly to the outside of the building and not into corridors. The outside walls at point of discharge should be brought to the edge of the door frame, doing away with the angle, which in many cases of panic has caused loss of life.

Turns in stairs should always be accomplished by landings or platforms. No winders should be allowed. There should not be less than three nor more than fifteen risers between platforms; a platform or landing should not be less than four feet wide. The last parts of a building to succumb to fire should be the stairs.

The proposed building ordinance calls for at least two separate and distinct stairways located so that from any point of the building there shall always be two different means of escape in case of fire. It prohibits any class-room door from being more than fifty feet away from the nearest stairway, which stairway shall lead to a street or an open space, with doors at the bottom of the stairs at least as wide as the stairs leading to them.

Whenever an arch or a door opening does not occupy the total width of the vestibule, corridor, hall or landing leading to it, the side walls of the vestibule, corridor, hall or landing shall be flared to an angle not greater than 30 degrees, so as not to allow any pocket on either side of the opening.

In two-story buildings the Code requires the basement to be separated from the stairway by a metal covered or kalameined door swinging in the direction of the outgoing passage and having self-acting door closers. In three or more story buildings the stairways are to be enclosed throughout. In any case, the construction of the stairs and landings is to be of strictly fireproof materials.

Regarding the automatic fire alarm which the Russell Sage Foundation shows to have been lacking in the Collinwood School fire, the proposed ordinance requires every school building two stories or more in height to be provided with a proper fire alarm or gong which can be operated from any story and can be heard throughout the building, such system to be in direct connection with the fire department, to be approved by the Board of Fire Underwriters and to be tested at least once a week.

It has been stated that the Collinwood fire might have been extinguished by the janitor had he had the apparatus at hand. The general provision of the building ordinance requires that such a building as a two-story school building should be provided with a stand pipe with sufficient length of fire hose to reach any point of the building. It might be a good precaution for the authorities in charge to have a few chemical extinguishers distributed throughout the building.

The question of fire drill has led to much controversy; nevertheless, it seems reasonable that if children have been taught how to behave and how to act in case of fire there shall be a better chance for them to escape

than if no precautions had been taken previously. The proposed ordinance requires fire drills, report of these drills to the fire chief, and gives the latter the right to call a fire drill to ascertain the efficiency of same. The fire chief has the power to give the necessary instructions and directions to bring the drill up to a certain standard.

All those different fire retarding devices preventing the rapid or sudden spread of fire, also these life-saving devices providing safe and rapid exits in case of alarm would seem to make a school building, built according to the above requirements, beyond any criticism from a humanitarian point of view. From an economical point of view, bearing in mind the fire-fighting equipment of the building itself and of the city department, it seems that a good many locations in districts where the population is not permanently settled calls for the construction of a safe but not necessarily fireproof building. We read in the report of the Survey of Public School System of Portland, submitted in November of 1913, the following:

"Since the Collinwood, Ohio, disaster, in which a number of children were burned to death in a poorly constructed wooden building, many ill-advised laws have been enacted in various states, relative to the construction of school houses and other public buildings. While distinctly favoring fireproof construction for all large and permanent school buildings, there is nevertheless such a thing as overdoing the matter. In a city such as Portland, where the centers of population are shifting so rapidly, there ought to be some opportunity, at this stage of the city's development, to build small semi-fireproof buildings, especially when these are so well removed from danger from without. Otherwise, the Board of School Directors may be compelled to risk making wasteful expenditure of public funds. When a basement is carefully fireproofed; chimneys carefully built; all electrical wiring done under rigid inspection; stairways made of fireproof construction, and ample in number; and sufficient exits are planned, with safety locks on all doors, the danger from fire within the building is so very small that the city ordinance now in force seems too rigid."

This report was made by experts on school problems both as to construction and administration, and it would seem wise to follow their advice.

The city of Portland would seem justified in following such a course if we remember that the city of Boston, which has been pointed out as a model city in school construction, is now building school buildings of second-class construction in its outlying districts. The new Ohio State Code, which is a model state code, in many respects allows two-story school buildings of composite or semi-fireproof construction. Wisconsin's new proposed code only requires fireproof construction for school buildings four stories high or a building three stories high with more than six hundred occupants. What we require is "Safe Buildings," which does not necessarily mean fireproof buildings.

INDUSTRIAL INFORMATION

Architect C. B. Barton of Oakland has moved from the Security Building to the First Trust & Savings Building.

Louis Beezer, of Beezer Bros., architects, Northern Bank Building, Seattle, returned recently from an extended pleasure trip through the East.

Somerville & Putman, architects, formerly located at 520 Pacific Building, Vancouver, B. C., have moved to the London Building, Fender Street West.

Architects Lawrence & Holford, Chamber of Commerce Building, Portland, have opened an office in Eugene, and have placed O. R. Bean in charge.

Architect Francis P. Rooney of Spokane, Wash., advises us of the completion of the plans for the Liberty Theater of that city; estimated cost $125,000.

Architect R. M. Taylor of Los Angeles has moved into new quarters at 910 Marsh Strong Building. Mr. Taylor was formerly located in the Douglass Building.

N. Clark & Sons, San Francisco, furnished cream matt glazed architectural terra cotta for the Gilroy High School, Gilroy, Cal. W. H. Weeks, architect, San Francisco.

Architects Wm. Redding & Sons of Denver, Colo., have opened a branch office in Nogales, Ariz., and would be pleased to receive catalogues and samples of all kinds of building materials for that office.

C. F. Weber & Co., San Francisco, have secured the contract for all equipment for the Eureka High School, amounting to nearly $10,000. They report a great deal of activity in school buildings at this period.

Los Angeles Pressed Brick Company, Los Angeles, furnished approximately 120,000 Red Ruffled Brick for the new Malabar-Street School, of that city. Withey & Davis, architects, Los Angeles, prepared the plans for this building.

Architect Fay R. Spangler, late of San Diego, Cal., and, prior to that time and for three years located in Seattle, Wash., has opened an office in the Monadnock Building, San Francisco, and wishes circulars and samples of building materials, etc., sent him.

The California State Highway Commission is using considerable quantities of Santa Cruz Portland Cement and Standard Portland Cement, according to a representative of the Santa Cruz Portland Cement Company, San Francisco. This concern reports the local consumption of their product as exceptionally good.

Gladding, McBean & Co., San Francisco, furnished cream matt enamel architectural terra cotta for the Franklin School, Bakersfield, Cal. The plans were prepared by Orville L. Clark, Bakersfield, Cal. This firm also furnished the brick for the Gilroy High School, Gilroy, Cal. W. H. Weeks, architect, San Francisco.

Steiger Terra Cotta and Pottery Works, San Francisco, furnished the architectural terra cotta for the Lux School of Industrial Training, San Francisco. W. H. Weeks, architect, San Francisco. The same material was used on the new Polytechnic High School, San Francisco. The plans were prepared by the Bureau of Architecture of the Board of Public Works.

A. C. Soule, manager of The Simplex Window Company, has returned from a recent trip to Southern California and reports that Simplex business is prosperous. Their representative in Los Angeles has completed the installation of Simplex wood and metal windows in the Merchants' National Bank twelve-story building; the Bible Institute Building, where there are some two thousand Simplex metal windows; the Auditorium Building, and several others, also a great number of school buildings throughout the surrounding territory and in Arizona

CALIFORNIA.

San Francisco—Architects Shea & Lofquist, Bankers' Investment Building, San Francisco, have completed plans for a three-story and basement, brick and steel school building, for St. Paul's Parish, at a cost of $50,000.

San Francisco—Architect B. G. McDougall, Sheldon Building, San Francisco, has completed plans for a three-story and basement apartment house, to be erected at the northwest corner of Larkin and Chestnut streets, at a cost of $60,000.

San Francisco—Architect Lewis P. Hobart, Crocker Building, San Francisco, has completed plans for a four and six-story and basement hospital building for the Regents of the University of California, to be erected at the Affiliated Colleges, at a cost of $600,000. Construction will be fireproof throughout with a complete steel frame and walls of brick and concrete faced with pressed brick and terra cotta.

San Francisco—Architect G. Albert Lansburgh, 709 Mission street, San Francisco, has practically completed plans for a three or four-story addition to the Concordia Club Building at the southeast corner of Van Ness and Post streets, at a cost of $75,000.

San Francisco—Architect G. A. Applegarth, Call Building, San Francisco, is working on plans for a five-story and basement Class C construction apartment house, for D. Clinton, to be erected at the southwest corner of Stockton and Powell streets, at a cost of $60,000.

Alhambra—Architect Norman F. Marsh, 212 Broadway, Los Angeles, has completed plans for a one and two-story and basement, brick school building, for the Alhambra School District, to cost $100,000.

Pasadena—Architect Myron Hunt, Hibernian Building, Los Angeles, has completed plans for a three-story and basement hotel building, of frame and plaster, for the Maryland Hotel Company, at a cost of $200,000.

Los Angeles—Application has been made to the building department for a permit for the erection of the twelve-story and basement steel frame bank and office building at the northeast corner of Fifth and Spring streets, for the Commercial Fireproof Building Company. The estimated cost is $750,000. The architects are Parkinson & Bergstrom, Security Building, Los Angeles.

OREGON.

Salem—Architect W. C. Knighton, Salem, has about completed plans for a two-story and basement, reinforced concrete and brick school administration building to cost $100,000. The building will form a part of the group of the State University buildings.

Portland—Architects Camp & Dupuy, 426 East Alder street, Portland, have completed plans for a four story and basement apartment house for C. W. Pallett, to be erected at the northwest corner of Eighteenth and East streets. It will be of brick and steel construction and will cost $85,000.

Eugene—Architects Hunzicker & Preusse, I. O. O. F. building, Eugene, has completed plans for a three-story and basement brick school building for the Eugene High School District. It will cost $100,000.

WASHINGTON.

Architect W. P. White, Transportation building, Seattle, has completed plans for a five-story and basement brick and steel apartment house to be erected at the corner of Eighth avenue and Seneca street, for the Seneca Investment Co., at a cost of $70,000.

Port Angeles—Architect Francis W. Grant, Melhorn Building, Seattle, has completed plans for a two-story and basement, reinforced concrete court house for Callam county. It will cost $75,000.

MISCELLANEOUS

Tuscon, Ariz.—Architects Bristow & Lyman, San Diego, have completed plans for the three-story, reinforced concrete agricultural building for the University of Arizona, to cost about $125,000.

Nogales, Ariz.—Architect H. O. Jaasted, Tuscon, has completed plans for the erection of a town hall at this place. It will cost $22,000.

Victoria, B. C.—Architect J. C. N. Keith, Victoria, has completed plans for a one-story and basement church building for the First Presbyterian Church, to cost about $50,000. The building will be of the Gothic style, with exterior of vitrified brick and white cut stone.

Vancouver, B. C.—Architect A. Campbell Hope, 603 Hastings W, has completed plans for a stone and brick sub-postoffice building in the Mount Pleasant District to cost $100,000.

Alaska Refrigerator

A Few of the Many Desirable Features:

1st. The **Alaska** refrigerator preserves foods with the smallest possible consumption of ice.

2nd. It saves ice and protects it through perfect insulation. The **Alaska** refrigerator is a non-conducteor of heat and cold. It never loses through radiation.

3rd. It has a perfect cold dry air circulation, adding to the life, flavor, purity, sweetness of every article of food in the various compartments.

4th. It is the embodiment of the pure food movement.

5th. It is beautiful in design and workmanship.

6th. It is made in numerous stock designs, or in special sizes to meet any requirements.

7th. It is the result of more than a third of a century of refrigerator experience that has witnessed the sale of over one million refrigerators.

8th. It preserves perishable goods at an even temperature of frigidity the year around.

9th. It has removable shelves, waste pipe, trap and ice rack.

ALASKA CIRCULATION

The circulation of the Alaska Refrigerator is such that the warm air rising from the provision chamber passes up through the warm air flues at each end of the refrigerator to the center of the lid or top, where it falls into the ice chamber through the lid or top flue directly upon the ice, where all moisture is condensed and is carried out of the ice chamber with the water formed by the melting ice. The air then passes entirely around the ice, and is freed from all impurities and moisture, and then falls into the provision chamber through the cold air flue, underneath the ice rack, pure, cold and dry.

FOR SALE BY

W. W. MONTAGUE & CO.

557-563 MARKET ST., Opposite Sutter SAN FRANCISCO

than if no precautions had been taken previously. The proposed ordinance requires fire drills, report of these drills to the fire chief, and gives the latter the right to call a fire drill to ascertain the efficiency of same. The fire chief has the power to give the necessary instructions and directions to bring the drill up to a certain standard.

All those different fire retarding devices preventing the rapid or sudden spread of fire, also these life-saving devices providing safe and rapid exits in case of alarm would seem to make a school building, built according to the above requirements, beyond any criticism from a humanitarian point of view. From an economical point of view, bearing in mind the fire-fighting equipment of the building itself and of the city department, it seems that a good many locations in districts where the population is not permanently settled calls for the construction of a safe but not necessarily fireproof building. We read in the report of the Survey of Public School System of Portland, submitted in November of 1913, the following:

"Since the Collinwood, Ohio, disaster, in which a number of children were burned to death in a poorly constructed wooden building, many ill-advised laws have been enacted in various states, relative to the construction of school houses and other public buildings. While distinctly favoring fireproof construction for all large and permanent school buildings, there is nevertheless such a thing as overdoing the matter. In a city such as Portland, where the centers of population are shifting so rapidly, there ought to be some opportunity, at this stage of the city's development, to build small semi-fireproof buildings, especially when these are so well removed from danger from without. Otherwise, the Board of School Directors may be compelled to risk making wasteful expenditure of public funds. When a basement is carefully fireproofed; chimneys carefully built; all electrical wiring done under rigid inspection; stairways made of fireproof construction, and ample in number; and sufficient exits are planned, with safety locks on all doors, the danger from fire within the building is so very small that the city ordinance now in force seems too rigid."

This report was made by experts on school problems both as to construction and administration, and it would seem wise to follow their advice.

The city of Portland would seem justified in following such a course if we remember that the city of Boston, which has been pointed out as a model city in school construction, is now building school buildings of second-class construction in its outlying districts. The new Ohio State Code, which is a model state code, in many respects allows two-story school buildings of composite or semi-fireproof construction. Wisconsin's new proposed code only requires fireproof construction for school buildings four stories high or a building three stories high with more than six hundred occupants. What we require is "Safe Buildings," which does not necessarily mean fireproof buildings.

INDUSTRIAL INFORMATION

Architect C. B. Barton of Oakland has moved from the Security Building to the First Trust & Savings Building.

Louis Beezer, of Beezer Bros., architects, Northern Bank Building, Seattle, returned recently from an extended pleasure trip through the East.

Somerville & Putman, architects, formerly located at 520 Pacific Building, Vancouver, B. C., have moved to the London Building, Fender Street West.

Architects Lawrence & Holford, Chamber of Commerce Building, Portland, have opened an office in Eugene, and have placed O. R. Bean in charge.

Architect Francis P. Rooney of Spokane, Wash., advises us of the completion of the plans for the Liberty Theater of that city; estimated cost $125,000.

Architect R. M. Taylor of Los Angeles has moved into new quarters at 910 Marsh Strong Building. Mr. Taylor was formerly located in the Douglass Building.

N. Clark & Sons, San Francisco, furnished cream matt glazed architectural terra cotta for the Gilroy High School, Gilroy, Cal. W. H. Weeks, architect, San Francisco.

Architects Wm. Redding & Sons of Denver, Colo., have opened a branch office in Nogales, Ariz., and would be pleased to receive catalogues and samples of all kinds of building materials for that office.

C. F. Weber & Co., San Francisco, have secured the contract for all equipment for the Eureka High School, amounting to nearly $10,000. They report a great deal of activity in school buildings at this period.

Los Angeles Pressed Brick Company, Los Angeles, furnished approximately 120,000 Red Ruffled Brick for the new Malabar Street School, of that city. Withey & Davis, architects, Los Angeles, prepared the plans for this building.

Architect Fay R. Spangler, late of San Diego, Cal., and, prior to that time and for three years located in Seattle, Wash., has opened an office in the Monadnock Building, San Francisco, and wishes circulars and samples of building materials, etc., sent him.

The California State Highway Commission is using considerable quantities of Santa Cruz Portland Cement and Standard Portland Cement, according to a representative of the Santa Cruz Portland Cement Company, San Francisco. This concern reports the local consumption of their product as exceptionally good.

Gladding, McBean & Co., San Francisco, furnished cream matt enamel architectural terra cotta for the Franklin School, Bakersfield, Cal. The plans were prepared by Orville L. Clark, Bakersfield, Cal. This firm also furnished the brick for the Gilroy High School, Gilroy, Cal. W. H. Weeks, architect, San Francisco.

Steiger Terra Cotta and Pottery Works, San Francisco, furnished the architectural terra cotta for the Lux School of Industrial Training, San Francisco. W. H. Weeks, architect, San Francisco. The same material was used on the new Polytechnic High School, San Francisco. The plans were prepared by the Bureau of Architecture of the Board of Public Works.

A. C. Soule, manager of The Simplex Window Company, has returned from a recent trip to Southern California and reports that Simplex business is prosperous. Their representative in Los Angeles has completed the installation of Simplex wood and metal windows in the Merchants' National Bank twelve-story building; the Bible Institute Building, where there are some two thousand Simplex metal windows; the Auditorium Building, and several others, also a great number of school buildings throughout the surrounding territory and in Arizona

CALIFORNIA.

San Francisco—Architects Shea & Lofquist, Bankers' Investment Building, San Francisco, have completed plans for a three-story and basement, brick and steel school building, for St. Paul's Parish, at a cost of $50,000.

San Francisco—Architect B. G. McDougall, Sheldon Building, San Francisco, has completed plans for a three-story and basement apartment house, to be erected at the northwest corner of Larkin and Chestnut streets, at a cost of $60,000.

San Francisco—Architect Lewis P. Hobart, Crocker Building, San Francisco, has completed plans for a four and six-story and basement hospital building for the Regents of the University of California, to be erected at the Affiliated Colleges, at a cost of $600,000. Construction will be fireproof throughout with a complete steel frame and walls of brick and concrete faced with pressed brick and terra cotta.

San Francisco—Architect G. Albert Lansburgh, 709 Mission street, San Francisco, has practically completed plans for a three or four-story addition to the Concordia Club Building at the southeast corner of Van Ness and Post streets, at a cost of $75,000.

San Francisco—Architect G. A. Applegarth, Call Building, San Francisco, is working on plans for a five-story and basement Class C construction apartment house, for D. Clinton, to be erected at the southwest corner of Stockton and Powell streets, at a cost of $60,000.

Alhambra—Architect Norman F. Marsh, 212 Broadway, Los Angeles, has completed plans for a one and two-story and basement, brick school building, for the Alhambra School District, to cost $100,000.

Pasadena—Architect Myron Hunt, Hibernian Building, Los Angeles, has completed plans for a three-story and basement hotel building, of frame and plaster, for the Maryland Hotel Company, at a cost of $200,000.

Los Angeles—Application has been made to the building department for a permit for the erection of the twelve-story and basement steel frame bank and office building at the northeast corner of Fifth and Spring streets, for the Commercial Fireproof Building Company. The estimated cost is $750,000. The architects are Parkinson & Bergstrom, Security Building, Los Angeles.

OREGON.

Salem—Architect W. C. Knighton, Salem, has about completed plans for a two-story and basement, reinforced concrete and brick school administration building to cost $100,000. The building will form a part of the group of the State University buildings.

Portland—Architects Camp & Dupuy, 426 East Alder street, Portland, have completed plans for a four story and basement apartment house for C. W. Pallett, to be erected at the northwest corner of Eighteenth and East streets. It will be of brick and steel construction and will cost $85,000.

Eugene—Architects Hunzicker & Preusse, I. O. O. F. building, Eugene, has completed plans for a three-story and basement brick school building for the Eugene High School District. It will cost $100,000.

◇ ◇ ◇

WASHINGTON.

Architect W. P. White, Transportation building, Seattle, has completed plans for a five-story and basement brick and steel apartment house to be erected at the corner of Eighth avenue and Seneca street, for the Seneca Investment Co., at a cost of $70,000.

Port Angeles—Architect Francis W. Grant, Melhorn Building, Seattle, has completed plans for a two-story and basement, reinforced concrete court house for Callam county. It will cost $75,000.

◇ ◇ ◇

MISCELLANEOUS

Tuscon, Ariz.—Architects Bristow & Lyman, San Diego, have completed plans for the three-story, reinforced concrete agricultural building for the University of Arizona, to cost about $125,000.

Nogales, Ariz.—Architect H. O. Jaasted, Tuscon, has completed plans for the erection of a town hall at this place. It will cost $22,000.

Victoria, B. C.—Architect J. C. N. Keith, Victoria, has completed plans for a one-story and basement church building for the First Presbyterian Church, to cost about $50,000. The building will be of the Gothic style, with exterior of vitrified brick and white cut stone.

Vancouver, B. C.—Architect A. Campbell Hope, 603 Hastings W, has completed plans for a stone and brick sub-postoffice building in the Mount Pleasant District to cost $100,000.

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THE PACIFIC COAST ARCHITECT

A MONTHLY JOURNAL FOR THE ARCHITECTURAL INTERESTS

SAN FRANCISCO
CALIFORNIA

VOLUME EIGHT
NUMBER FOUR

OCTOBER, 1911

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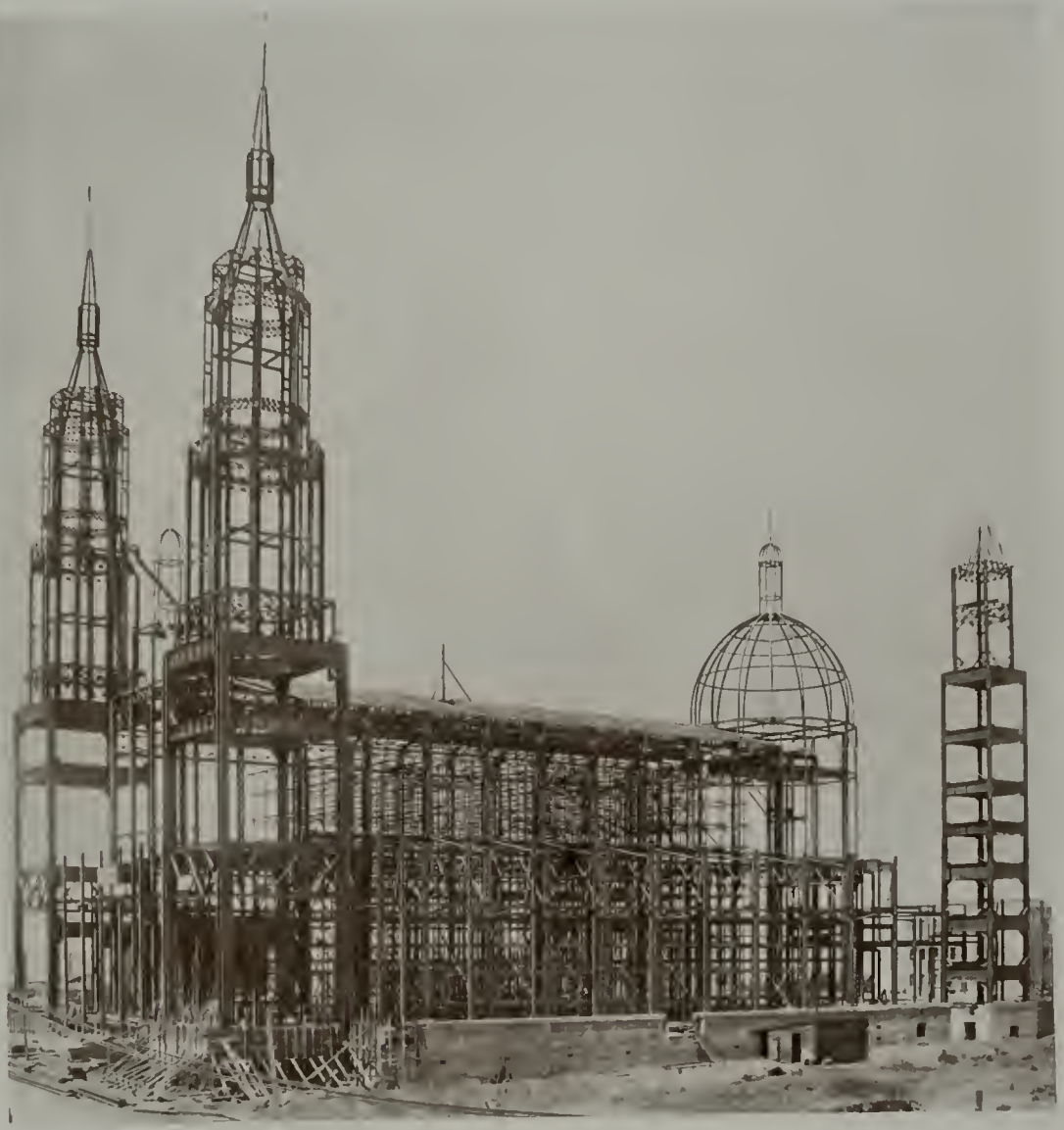

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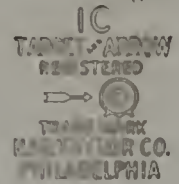

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The Pacific Coast Architect

VOLUME VIII — SAN FRANCISCO, CALIFORNIA, OCTOBER, 1914 — NUMBER 4

THE PACIFIC COAST ARCHITECT

J. A. DRUMMOND - - - - - - - - - Editor and Publisher

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Changes in, or copy for new advertisements must reach the office of publication not later than the Fifteenth of the month preceding issue.

The Editor will be pleased to consider contributions of interest to the readers of this publication. When payment for same is desired this fact should be stated. Self-addressed envelopes must accompany all such contributions.

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EDITORIAL

Europe's Cataclysm Will Help Business

Although incomparable with any event in past history, the great conflict now raging on the European battlefields, while practically putting all business at a standstill in Europe, will offer great opportunities to American business, rather then effecting any result to the contrary. This truth is now pretty well accepted by hard-headed business men of this country and already steps of great magnitude have been taken with a view to taking advantage of the opportunities thus thrust upon us.

This question of what will happen to American business, in the face of the war, has been pretty carefully gone over during the past weeks. It has been discussed from every angle, in the press and out of it. There has been a gradual sifting down of the fundamentals involved until to-day, when there is some certainty of getting at the real truth in the situation. An overwhelming majority see naught but good in the situation—an advantage that will more than discount any harm to business.

There is apparent, however, somewhat of a tendency on the part of bankers to be more conservative than ordinarily. It is claimed by some people that the tightness of the money market has effectively stopped all investments and has particularly hurt the building world. This may be true in certain localities; but in certain localities only, and is a situation that will right itself shortly.

The Secretary of the Treasury has gone after those bankers who are attempting to hoard money in aggressive manner. Results have been immediate.

Taken by and large and there is but a single outlook, and that is unlimited opportunities for American business.

♠ ♠ ♠

Architectural Masterpieces Destroyed

Destruction of a multitude of towns and villages, containing priceless works of art and masterpieces of architecture, on the European battlefields, is but another resultant phase illustrative of the tearing down of all those things which we have been taught to be the best in life and civilization—a complete wiping out of all that represents higher civilization by the war-maddened hordes.

Great cities of France, Germany, Austria and Belgium have all suffered the loss of historic cathedrals, museums, sculpture and architecture, representing the heritage of the past and the inspiration for many of the most famous works of the present day.

Reports from the headquarters of the warring nations would have you believe they were attempting to respect historic monuments, but let such monuments offer a possible strategic stronghold and all "respect" vanishes into thin air; the greatest of cathedrals and monumental buildings have already been used as fortresses under actual fire.

Similar losses of the past, that were slight as compared with the present terrible and wanton destruction, have brought forth loud wails from civilized mankind, but such an appeal would now go unheard. The best we can do is to hope for the preservation of as much of the art of Europe as fortunate circumstances will allow. This, however, and, in any event, gives out but little satisfaction.

♠ ♠ ♠

Western Home for Woodrow Wilson

Plans for the construction of a magnificent summer home for the President of the United States, to be located among the foothills of the Rocky Mountains, some miles west of Denver, Colo., have been completed.

The building proper will cost about $60,000, but this is a minor part of the entire plans, for it is proposed to construct magnificent approaches to the castle on the hill, entailing an expenditure of perhaps $200,000.

John Brisben Walker, owner of a magnificent estate in the above section, has donated the land which has been accepted by the Government, after years of advocacy of such a plan by the land owner.

It is announced that President Wilson has consented to lay the cornerstone for this summer home. Mr. Walker has already done enough preliminary work on the foundations to permit the performance of this ceremony at any time. The stress of present political and diplomatic activity at Washington has precluded the possibility naming this date now.

The exact site of the new summer home is at Mt. Falcon, fifteen miles west of Denver, as the crow flies, in a most picturesque setting. Mt. Falcon rises several hundred feet above Denver and is just midway between that city and the great Continental Divide. From this site there is a splendid view of the Rockies to the west, while to the east the great plains sweep below.

This enterprise will certainly commend itself to the people of the West. It offers a possible architectural landmark.

Legal Restrictions Upon Buildings

Suggested by the discussion that has been going on in Architectural Journals of late looking to greater harmony between the building ordinances of the various cities, the matter of legal restrictions upon the building of public and semi-public buildings outside of cities is worthy of consideration.

It is a notorious fact that the hotels in particular throughout the country in towns not large enough to support an organized department of building inspection are built entirely without regard to the safety of occupants; the same is true of theatres and lodge buildings and to some extent of schools.

The various State Legislatures could far better devote a share of their time to the formation of a code of minimum requirements intended to conserve life and property in the building of hotels, theatres and places of public assembly in unincorporated towns and cities than in the working out of "newfangled" methods of re-electing themselves.

It is hoped that when the Legislatures do wake up to the propriety and necessity of this line of action that they will do so in temperance and not attempt to provide text books on building construction as seems to be the tendency of ordinance tinkers of city governments at the present time. A code of minimum requirements is all that should be attempted and anything more than this in any building code whether for city, town, or country is not only superfluous but foolish.

♠ ♠ ♠

Moore's Statement Silences Rumor

There have been numerous reports to the effect that the Panama-Pacific International Exposition, because of the war in Europe, would be postponed.

To offset this unfounded rumor, President Charles C. Moore of the Exposition, has issued a signed statement to the contrary, and further declaring that the war would not even affect the commercial or the educational importance, or the financial success of the exposition, in the slightest degree.

In clear-cut manner President Moore has told how the exposition will prosper despite the European conflict. He predicts that the war will be advantageous, rather than otherwise, as far as domestic participation in the exposition is concerned. As regards the latter phase, the effect of the European war seems likely to stimulate such participation in marked degree, as American manufacturers become impressed with the opportunity given by the exposition for bringing their goods to the attention of the large distributors of Central-South America, the Orient and Canada.

The exposition will open on its scheduled date, February 20, 1915. It will be completely ready when open. It is more than ninety per cent completed today. Nothing will be permitted to interfere with the consummation of the plans originally laid down.

♠ ♠ ♠

San Francisco's Building Record

The Bureau of Building Inspection of the San Francisco Board of Public Works has prepared an interesting report showing what building construction has been carried on throughout the city and county since the fire of 1906.

Since May, 1906, to August 31, 1914, there were 51,864 buildings erected at an estimate cost of $257,020,300. This figure does not include construction of city railways, sewer work, street improvements and tunnels, and does not include work done by the United States Government in the construction of docks, schools, etc., or work undertaken by the State Board of Harbor Commissioners.

During the same period the report shows there were 173 Class "A" buildings erected at an expenditure of $33,287,654; 109 Class "B" buildings, at $14,670,180; 2,747 Class "C" buildings, at $81,741,818; 25,341 frames, at $96,333,536; 23, 335 alterations, at $18,240,175; sixty-one exposition buildings, at $9,300,277, and eight public buildings, at $4,277,603. Total, 51,864 buildings, at an estimate cost of $257,920,300.

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Cuban Building at the P. P. I. E.

The Cuban Government has appropriated $250,000 for participation in the Panama-Pacific International Exposition. The Cuban pavilion will occupy a site 160 feet square between the Presidio gate and the Japanese temple. It will be of Spanish Renaissance architecture, and will be built on the lines of the beautiful Spanish-American hacienda residences. The building will be 117 by 144 feet in area, with towers 125 feet high. With the furnishings it will cost $100,000.

The central patio, always a distinctive feature of Spanish houses, will contain beautiful gardens and fountain effects, and will be provided with a band shell, where music will be provided for balls and receptions.

Architect Francisco J. Centurion, of Havana, and now located at 2256 Van Ness Avenue, San Francisco, the architect of the building, was the victor in a prize contest competed in by many Cuban designers.

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Manila Takes Extensive Precautions

An ordinance providing that all buildings constructed in the city hereafter must be rat proof, has been passed by the municipal Board of Manila. The measure is for the purpose of safeguarding the public health against bubonic plague. Hollow walls and partitions are prohibited. Walls, with the exception of those of solid wood, must be of concrete, brick, stone, mortar, or other material that will keep out rats, to a height of one meter (3.28 feet), from the ground, and must extend below the surface of the ground at least twice the thickness of the wall. All hollow construction is forbidden except it be without apertures through which rats may pass and of materials through which they cannot make their way. For violation of the provisions of the ordinance a penalty is provided of a fine not exceeding $100 or imprisonment for not more than six months, or both.

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Panama Canal Receives Scant Notice

Probably because of the more conspicuous attention paid to affairs in Europe at the present time, the opening of the Panama Canal to general commerce last month received comparatively scant space in the daily press and, as has been said, "the greatest engineering feat on the American continent has won its end and started momentous new channels of world-wide trade without great acclaim."

The canal is now in active operation for vessels drawing not more than thirty feet of water. War vessels of the fighting European nations as well as other foreign countries, will have full use of the canal, but under stricter regulations than the merchant marine.

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Reinforced Brick Work.

The construction of curtain walls for steel frame structures underwent an improvement when reinforced brick work was employed in this position. When good cement mortar is used this type of work is the best extant today. Its cost is less than other forms and it more successfully meets the demands of fire and weather resisting qualities than other materials. Reinforced with vertical rods to resist lateral action gives these walls ample rigidity for all purposes.

Description of St. Ignatius Church

BY CLARENCE P. KANE

With the dedication by His Grace, the Most Reverend Archbishop Riordan, in August, of the new St. Ignatius Church, on Fulton Street and Parker Avenue, San Francisco, this magnificent edifice has been the subject of much interest throughout the country. This splendid design was conceived by Architect Mr. Charles J. I. Devlin, whose offices are in the Pacific Building, and to him the highest credit is due for work of the finest example in every detail.

This church will stand as a monument for ages and as a tribute to the present generation. San Francisco Catholics indeed have raised to the honor of God a splendid church, in which the various branches of art are a witness to the genius of man.

The first object to attract the attention of the ocean voyager approaching San Francisco from the north or south or the distant Orient is this beautiful pile of Italian Renaissance with its two massive towers reaching toward the sky. When these towers and the dome, which rises to almost equal height, and crosses thereon are illuminated by electric lights, the object that first greets the voyager and bids him welcome to the City of St. Francis will be visible by night as well as by day. The church, which stands on an elevation, at the high point, of 540 feet from the city base, also presents from nearly every portion of San Francisco and from the trans-bay cities an equally majestic appearance.

To make a brief study of the completed structure from an architectural standpoint would be next to impossible; the work is too great. One has only to gaze upon the splendidly carved wood work, upon the stucco work, the apse and arch and architrave; let him wonder at the mellow light diffused throughout the immense building, falling upon stately columns and throwing out in glorious nuances of light and shade the capitals and cornices and moldings above.

The view of the auditorium presented to the priest as he turns at the altar toward the congregation and looks down the nave, 190 feet long, is a feast for the eye—the glorious perspective, the graceful and slender arches, the mellow shadings of the recesses in which are installed altars and confessionals; and if one of the doors on Fulton Street chances to be open, a wonderful picture of green, waving tree tops from the park, a glimpse of the distant hills, in the kaleidoscopic view of many-colored houses scattered in between.

Behind the delicate lace-work of plaster, which catches the wandering eye of the observer who surveys the swelling curve of the apse, is the triforium. Here the Fathers, the Scholastics or the Brothers may attend services unobserved. It consists of a passage way running the full curve of the apse with a continuous kneeling board below and an elbow shelf at the proper height. Here the kneeling Scholastic may look through the lattice down upon the altar and out upon the whole splendid vista of the church.

On the same floor there are large store rooms with an elevator going down to a hall near the sacristy.

Standing in the parapet on the tower a magnificent panorama is unfolded to the beholder. The city of San Francisco is spread out in full detail, bordered by blue waters and encircled by hills; on one side little aquarelles of San Francisco Bay; on the other, the expanse of the great Pacific, which loses itself in the horizon.

Approaching the church from the north, on the side of Parker Avenue, one is impressed by the magnificence of it all. The dome, which swells its glittering and graceful form in the sun, is supported by immense Corinthian columns. Between the columns marble-trimmed panels of great beauty are conspicuous for the delicate appropriateness. Upon nearer approach is seen the long colonnade of fluted columns and arches.

A survey of the facade from the Fulton Street side shows a lower order in the Ionic style, and an upper order in the Corinthian style of architecture. The fourteen columns with Italian Renaissance caps support a cornice that runs from tower to tower, and this ends in a balustrade of fancy proportions. Back of the balustrade there rises another row of columns, Corinthian in style, supporting a projected pediment and crowned by a lantern of exceptional beauty.

The building is located on the northeast corner of Fulton Street and Parker Avenue, occupying 154 feet on the Fulton Street front by 263 feet on Parker Avenue.

There are five principal subdivisions of auditorium consisting of the nave, 60 by 150 feet; east and west aisles, 24 by 150 feet, and sixteen side altar bays, 16 feet square.

Granite steps, 56 feet in width, lead to the front portico which is 12 by 70 feet. The sanctuary is 60 feet by 62 feet, semi-circular, and is flanked by two altar bays, 20 by 24 feet. The sanctuary is mounted by a dome 50 feet in diameter, which stands 152 feet above the grade. Back of the sanctuary there is a series of sacristies and rooms for vestments. The height of the auditorium is 74 feet; the sanctuary is 66 feet high; east and west aisles 40 feet high, and the side altar bays 22 feet high.

The east and west towers reach to a height of 213 feet above the high point of grade.

The building receives natural lighting from eighteen windows in the clere story and also from eighteen circular windows in the east and west aisles.

Standing on the east side of the church there is a campanile 18 feet square, 150 feet above the high point of grade. The bell mounted thereon is an old relic of San Francisco. It was previously used by St. Ignatius Church, then located at Van Ness Avenue and Hayes Street, and prior to that time on the old Emporium site, by the same church. It weighs 6,000 pounds.

The vestibule and portico of the church have marble floors. The wood work in the vestibule and baptistry is of mahogany, while the wood work in the balance of the church is white cedar.

The interiors of the auditorium and sanctuary are in cast and run plaster, a magnificent piece of work by A. Knowles, 985 Folsom Street. The plaster decorations have been pronounced a work of art.

The church will seat 1,700 people in the auditorium and 300 in the gallery.

A remarkable feature of the furnishings is the pews. Each pew has an apparatus which admits heat in the cold season or cools the atmosphere in hot weather. R. Brandelin & Co., San Francisco, manufactured and installed all seating.

From his seat the observer will notice that there is a somewhat unusual level of the altar floor. From any part of the church the priest may be distinctly seen.

The music from the organ and choir will fall in pleasing cadences upon the ear of the worshiper, for the sound will come from a height where arches and cornices have ceased, and with nothing to intervene, it will reach the listener full toned and with uninterrupted force.

The exterior walls are of brick and the decorative features have been brought out largely in terra-cotta on the main portion and clere story of the building. As an ex-

ample of brick work the church is well worth a visit. All the material used in this line came from the plant of N. Clark & Sons. The regularity and fineness of the joining, combined with the apparent solidity of the walls, show careful and watchful workmanship.

Molded and enriched brick work has been freely used on the arches and panels of the main walls, on the ground and upper stories and also on the walls of the dome. These enriched bricks are of varied design and give a fitting touch to the delicate detail of the building.

A strong effect has also been gained by the columns of the main entrance. These columns are of terra-cotta and stand massive and free at the top of the flight of stairs leading to the portico. There, in the portico, a group of five doorways make an interesting study. These doorways are arched and constructed with terra-cotta, as also are the piers from which these arches spring.

On Parker Avenue there is also a colonnade effect obtained on the lower walls by the use of engaged columns. These columns, like those on the front, are large and massive. The fluting and entasis of the columns are in keeping with the care taken in handling the detail of the building.

The side entrance, between two of the columns on Parker Avenue, is a fine example of detail carried out in terra-cotta. This doorway, with its plain molded jambs and lintel surmounted by an enriched cornice and cartouche, is very effective. The cartouche is delicately molded with a wreath and cross design. Two figures form the flanks on each side of the cartouche.

On the clere story a rich effect is gained by a series of arches of terra-cotta over the windows with circular panels between.

These arches, which give an arcading effect all around the building, spring from caps on top of the paneled piers of the clere story. All the terra-cotta in this portion of the structure is richly decorated with well chosen ornaments. As before stated, all the brick and terra-cotta for this large edifice were furnished by N. Clark & Sons, and the utmost care was shown by this firm in carrying out the architect's details and instructions.

About one quarter million face brick were used in this building, including the molded and enriched brick.

The steel frame for the church was fabricated and erected by the Central Iron Works, of San Francisco. Mr. W. W. Breite was the engineer. One hundred tons of steel were used in the building.

The main auditorium of the church is heated and ventilated by the indirect plenum system, installed by Mangrum & Otter, under the direction of William E. Leland, consulting engineer.

The fresh air is drawn into the fanroom through a vertical shaft in the center of the campanile and is delivered by the ventilating fan through a heating stack of vento radiation. From this point the warmed air is delivered to the auditorium through a system of galvanized iron ventilating ducts under the floor to register screens in the ends of the pews and through register screens in the alcoves on each side of the main auditorium.

Supplemental direct radiation is placed at the back of the auditorium near the entrance doors and in the sanctuary. There are also long steam coils placed at the level of the clere story windows on each side of the building.

Individual rooms in the building are heated by direct steam radiation.

The boiler and ventilating fan are located in an isolated boiler room outside of the main building.

Crude oil is used for fuel and is burned under the boiler by means of the Johnson low pressure oil burning system.

The many conditions, the many special requirements and the many architectural details had to be taken into consideration in the installation and laying out of the electrical equipment. In order to have a flexible, satisfactory and easily controlled lighting and power system, considerable work was required on the part of the Butte Engineering & Electric Company, which concern handled this end of the work. The installation consists primarily of a main service switchboard, on which all the main service switches are located, the various and main power switches, different feeder switches, the master remote control switches for controlling the east and west lower crosses, station lighting, general lighting and power meter.

Two phase, 220 volt alternating current, is provided for power, and single phase 110, 220 volt, for lighting. From this service board circuits are installed to the main controlled switchboard, located in the east vestry, to the panel boards in the organ loft, east and west towers, to the power house for heating and ventilating motors and to the various motors installed in the church building. All the lights within the church are controlled from the main switchboard and, no matter what lights are burning therein, one can tell at a glance which lamps are lit. In order to further simplify the operation of this main switchboard a complete floor plan, showing all the lights, is provided at this board.

The main interior lighting consists of direct illumination with the exception of the sanctuary which is further illuminated with concealed lighting placed in the sanctuary arch. The tower crosses are outlined with fifty-four eight candle-power lamps, each installed on the outer edge of the crosses. These crosses are eight feet in height.

The success of the building as a whole and the smoothness of operation during contruction was due to the complete set of plans, specifications and detail drawings prepared by the architect.

As an example, the electric wiring and illumination plans may be mentioned, which consisted of fifteen drawings, 33 inches by 44 inches, besides a number of small drawings. These drawings showed in detail all conduits, wires, pull boxes, switches, etc., and the sizes and exact location of same. All connections and unusual schemes of light control, etc., were shown diagrammatically, and all details, such as distributing panels, switchboards, indirect lighting and special switching devices, were shown in full size or large scale drawings.

The electrical and illuminating plans and specifications were prepared by Charles T. Phillips, consulting engineer, under the direction of the architect.

J. Looney, plumber, 85 City Hall Avenue, San Francisco, installed all plumbing in the new St. Ignatius Church, San Francisco. This installation has been generally reported as a most excellent piece of work.

Over 4,000 barrels of Santa Cruz Portland Cement were used in construction of foundations, etc., of the new St. Ignatius Church at Fulton Street and Parker Avenue, San Francisco. The specifications prepared by Architect Devlin, under which this cement was used, were very rigid, and required that each sack must contain ninety-four pounds of cement, in addition to the physical requirements as laid down by the American Society for the Testing of Materials. The firm of Robert W. Hunt & Company, San Francisco, testing engineers, was appointed by the architect to test all of the cement used in this work and to weigh each sack to make sure that the terms of the specifications were complied with. The Santa Cruz Portland Cement Compaay feels proud in saying that Santa Cruz Portland Cement was found in every way satisfactory to the architect.

The mill and cabinet work for the church was manufactured and installed by the Spencer Street Planing Mill, of this city.

The towers and metal railings were all sanded and colored to blend with the brick and terra-cotta dome, the towers and campanile. The balustrades were also sanded and colored. This work and all painting in the church was done by the J. Llewellyn Company, painters and decorators, 1635 Broadway, Oakland.

The Forderer Cornice Works, San Francisco, installed the roofing and all cornice work on the church. Three hundred boxes of 14-inch by 20-inch Target-and-Arrow roofing tin, manufactured by N. & G. Taylor Company, Philadelphia, were used on the job. The sheet metal contract amounted to $38,700—the largest ever let on the Pacific Coast.

W. P. Fuller & Co., San Francisco, furnished the glass for the church.

An unusual feature in the interior decoration will be the installation of magnificent paintings in the panels over the several altar bays. Professor Pietro Ridolfi, of Rome, has already forwarded a beautiful canvas, which, more or less, is a sample and gives some idea of how the paintings will appear. The drawing and color blend is fascinating.

Recently photographs have been received reproducing the entire set of paintings, and as these reproductions pass in review it becomes easy to imagine the splendid effect of the finished pictures and to value the art treasures at St. Ignatius Church. These paintings represent the well-known scenes in telling manner. The work of painting these pictures was awarded to Professor Ridolfi after five other artists had been considered, including two Americans, one Belgian and one German. The full set of paintings is now on its way from Rome.

It would be impossible to write about this church without mentioning the name of Father Trivelli, President of St. Ignatius University, and the priest in charge of the preparations for the building. Rarely has a priest been charged with a task so comprehensive and, at the same time, so difficult. For two years Father Trivelli has been at work familiarizing himself with the work in hand. He has been on the job almost constantly, supervising actual building. Father Trivelli is today receiving unstinted praise for his most important work in connection with the building of this beautiful structure.

St. Ignatius as a whole is distinctly a significant addition to architecture—a most notable achievement in recent ecclesiastical architecture. The precision and the finesse and attenuation of the work as a whole is on a well studied scale not only in proportion but in detail. It is rugged and refined and virile and massive, and yet not heavy. It is a delicate piece of work, and yet not trivial. It represents an heritage of all ages without being archaeological.

Bonds of Brick Work

By NATHANIEL ELLERY, C. E.

Many people today still regard brick in building construction as simply so many units of burned clay placed or tied in the work with mortar for beds and joints. They think of it as ordinary work without appreciating the time and study devoted to it by architects and designers. The arrangement of the bricks has been given little thought except by the workers in this material and yet we find in brick the finest architectural successes. It lends itself to many combinations of color, texture and arrangement which gives ample latitude for artistic success.

Aside from the purely esthetic features of brick bonds, the structural value should not be overlooked. To obtain structurally sound brick work we must use stretchers and headers to bind the mass together and fundamentally, the English and Flemish bonds are the bases from which all ornamental and structural bonding is derived. Running bond or bricks laid lengthwise in a wall has inferior strength when compared to the other bonds or variation of those previously mentioned. In English bond we have a row of headers and then a row of stretchers the vertical joints of each kind are in alignment and the alternate headers are centered over the stretcher vertical joints while in Flemish bond there is in each row an alternate of headers and stretchers with each header centered vertically over the underlying stretcher. From these principal bonds we vary the arrangement and with different colors produce pattern brick work of many designs. This, with the various mortar joints, gives innumerable combinations. Now, if we move the alternate stretcher course of brick in English bond one-half length to break joint with the underlying stretcher course, there is obtained the English cross bond or Dutch bond, and again should the header course of English bond be placed as every third, fourth, fifth, etc., course, we have our common bond so often seen in blank walls of our buildings.

One of the simplest modifications of Flemish bond is by having two stretchers take the place of the one and thus simply acting as a double length of brick in this position, and again by inserting an alternate stretcher course we make another change in Flemish bond. Another simple change in this bond is by shifting each header one-half its width laterally as we progress in courses, so that the headers form a diagonal line. This is known as Flemish Spiral bond.

By shifting headers and stretchers and changing courses one can imagine the vast number of combinations possible. From Flemish bond as a base we derive most of the pattern work. In this, good, accurate workmanship is essential to bring out the best ideas of the architect and make the pattern work have the appearance dictated by the design.

Many times little attention is paid to the mortar joints and thus the full value of brick bonding is damaged just so much. There is no feature more necessary to complete a design than the proper joint. In color, size and depth of mortar joints there exists much chance for good or unsightly brick work. For the sake of strength all mortar should be of a liberal percentage of cement in order to give the strength of adhesion between the brick and the mortar.

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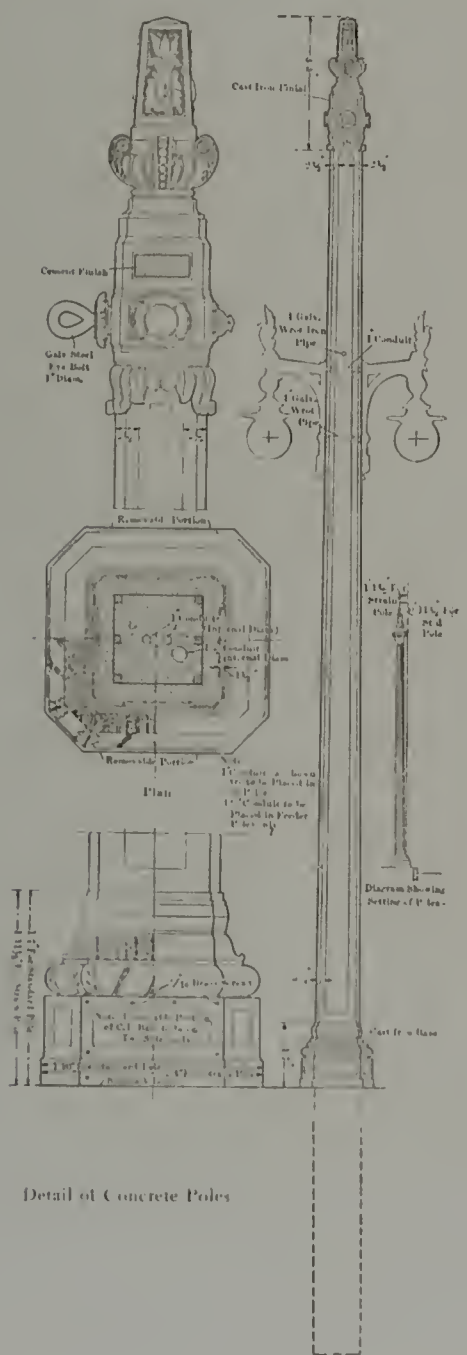
Recent Legal Decision

A building contract permitted the owner to request alterations which should not void the contract, the amount of alterations to be added to or deducted from the contract price. It also provided that on the demand of either the contractor, owner or architect the value of all changes should be fixed in writing. The contract price was $10,000 and certain changes were made costing $130, the value of which was not fixed in writing, no demand therefor having been made by contractor, owner or architect. It was held that the surety on the contractor's bond was not released from liability because of such alterations.—Wolf v. Aetna Indemnity Co., California Supreme Court, 126 Pac. 470.

Practicability of Concrete Poles

A great deal of interest has been shown in the erection and finishing of the trolley poles for the San Francisco Municipal Railway System.

The City Engineer's office made exhaustive investigations into the advisability and practicability of using an ornamental concrete pole in place of the regulation one of iron. The result of this investigation was the erection of upwards of 1,000 concrete poles. Of particular interest from an architectural standpoint are the ornamental poles erected on Van Ness Avenue.



Detail of Concrete Poles

There was great discussion as to whether the erection of poles would mar the natural beauties of the avenue, but the poles as completed blend in well with the general architectural and color tones of the avenue and are as nearly artistic as a trolley pole can be made.

The designing of the ornamental poles is the product of the city's Consulting Board of Architects, while the engineering details were worked out by J. R. Wood of the Engineering Department, who also designed the concrete poles for the other lines of the system—all of the work being under the supervision of M. M. O'Shaughnessy, City Engineer.

Great credit is due to the Engineer's office and the general contractor for the prompt execution of this work. Very often municipal work is allowed to lag, so that the prompt completion of the municipal railway system certainly reflects credit upon those engaged in its construction.

The following is a summary of the specifications used in the construction of the poles: Proportions of concrete: All concrete shall be composed of Portland cement, sand and broken rock, in the proportion of one cubic foot of cement, sand and broken rock, in the proportions of one cubic foot of cement, two cubic feet of sand and four cubic feet of broken rock. Portland cement finish. All the exposed surface shall be prepared by removing all loose material adhering thereto and by thoroughly washing with water, after which they shall be finished with cement mortar composed of one part Portland cement, one part Keystone sand and two parts of bank sand applied by means of a cement gun. Concrete paint: After the cement finish has been applied as specified above, all exposed concrete surfaces shall be painted with two coats of "Concreto" as manufactured by the Muralo Company, or some equivalent concrete paint.

The Muralo Company, for which Mr. A. L. Greene is the agent, supplied the "Concreto" cement coating for all the municipal railway trolley poles of the entire system. Two coats were applied to the Van Ness Avenue poles and two coats applied directly to the concrete on the other lines.

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Urges National Type of U. S. Architecture

Paris—William Hunt Diedrich, a young American sculptor and architect, who has won fame after six years of work here in comparative obscurity, says:

"I have a number of commissions on hand now, but as soon as possible I intend to return to America.

"American architecture should be more emancipated. I have nothing to say against steel-work and sky-scrapers, for they are the natural outcome of the national requirements, but in almost every other respect American architecture is laboring under European traditions completely out of keeping with the American temperament. A Greek temple would look ridiculous in a country of pine trees.

"America should develop a national style of architecture, inspired by American nature, as the Gothic and old Norman styles were suggested by the conditions of the countries and the temperament of the people who created them. The Southern States require a much more exotic style of architecture than they have at the present day."

Diedrich is a grandson of William Hunt of Boston, the artist decorator of the Albany Capital.

St. Ignatius Church, San Francisco. View from Southwest
Chas. J. I. Devlin, Architect, San Francisco

Photo, Gabriel Moulin

South Facade

West Entrance

St. Ignatius Church, San Francisco
Chas. J. I. Devlin, Architect, San Francisco

St. Ignatius Church, San Francisco. View from Northwest
Chas. J. I. Devlin, Architect, San Francisco

Photo, Gabriel Moulin

St. Ignatius Church, San Francisco. Parker Avenue Facade

St. Ignatius Church, San Francisco. South Portico
Chas. J. I. Devlin, Architect, San Francisco

St. Ignatius Church, San Francisco. Dome
Chas. J. I. Devlin, Architect, San Francisco

Photo, Gabriel Moulin

North View of East Tower

Photo, Gabriel Moulin

Second-Story Tower Window

St. Ignatius Church, San Francisco

Chas. J. I. Devlin, Architect, San Francisco

St. Ignatius Church, San Francisco. Roof and Clere Story Detail

Photo, Gabriel Moulin

Chas. J. I. Devlin, Architect, San Francisco

Northwest View looking Toward Sanctuary

View of Gallery, Looking West

Photo, Gabriel Moulin

St. Ignatius Church, San Francisco

Chas. J. I. Devlin, Architect, San Francisco

Detail View of Sanctuary Doors

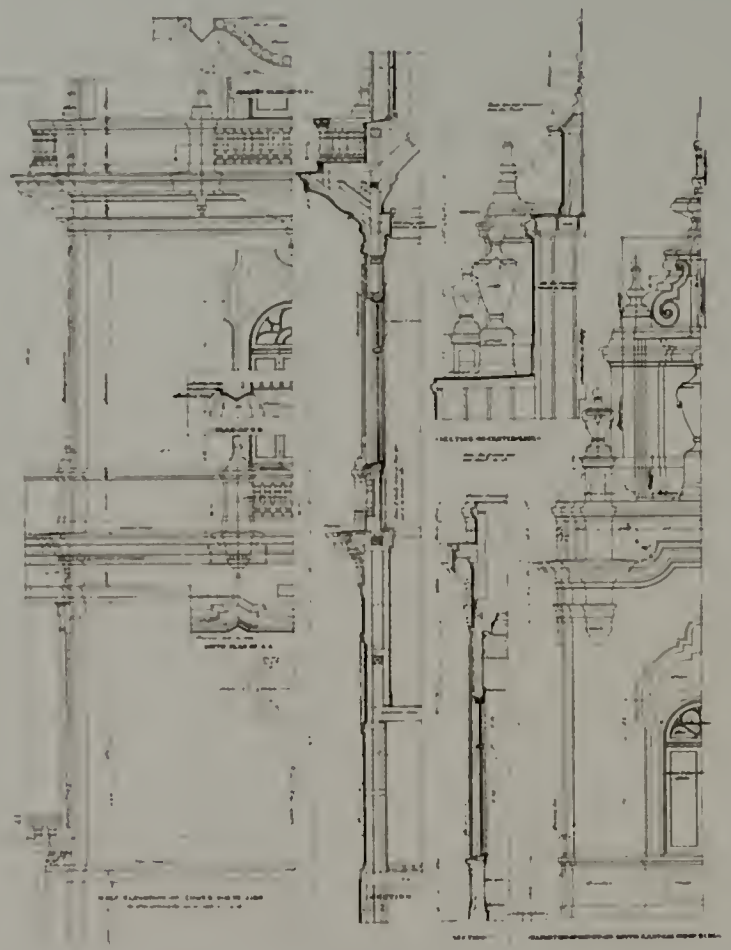
Photo, Gabriel Moulin

St. Ignatius Church, San Francisco. East Aisle looking toward Sanctuary

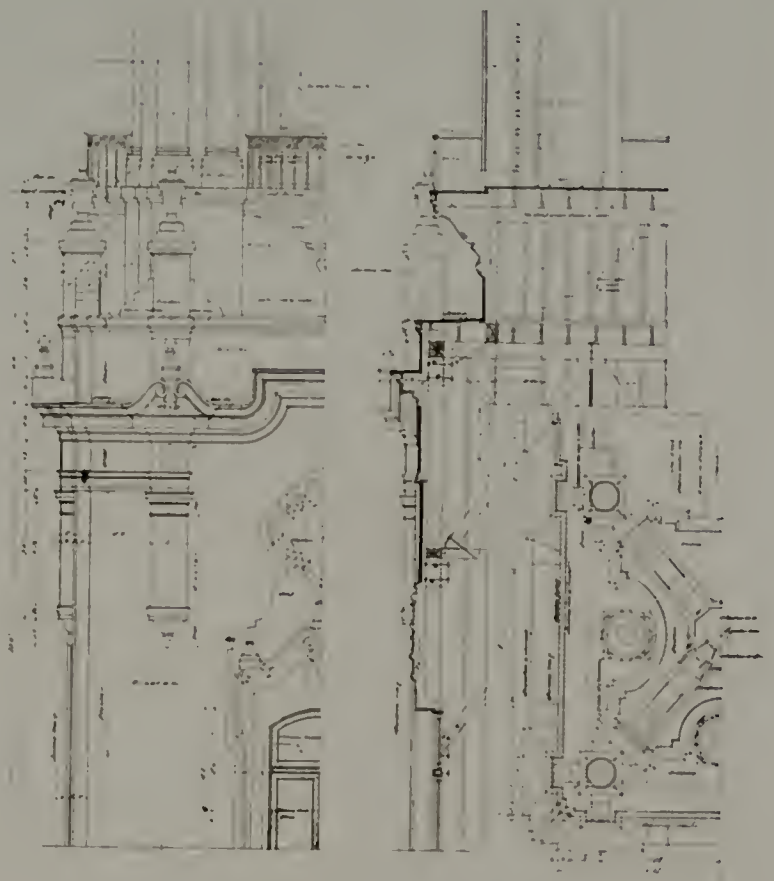
Chas. J. I. Devlin, Architect, San Francisco

Cuban Building, P. P. I. E. East Elevation
Francisco J. Centurion, Architect, Havana, Cuba

Cuban Building, P. P. I. E.
Francisco J. Centurion, Architect, Havana, Cuba



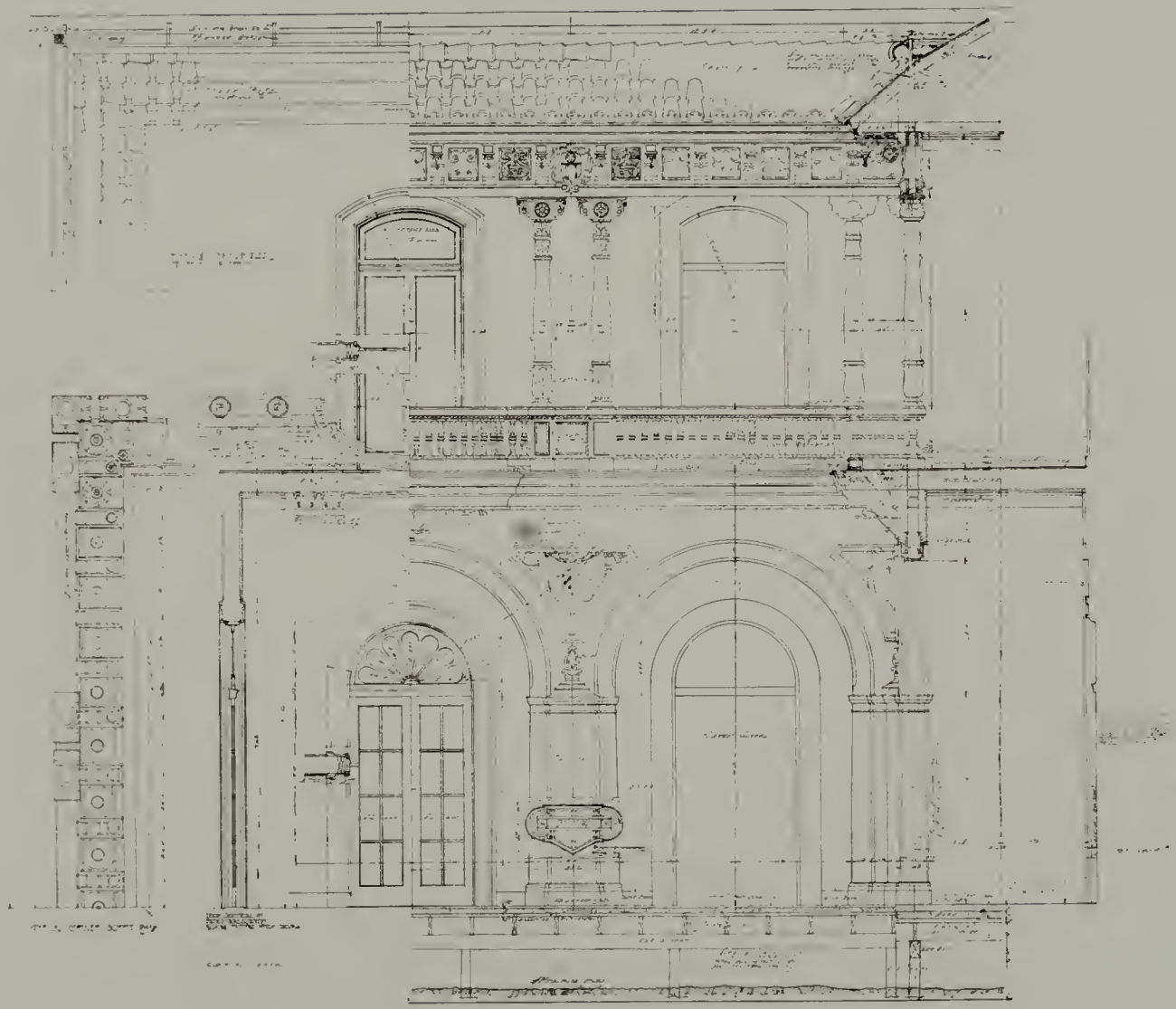
Main Tower Details



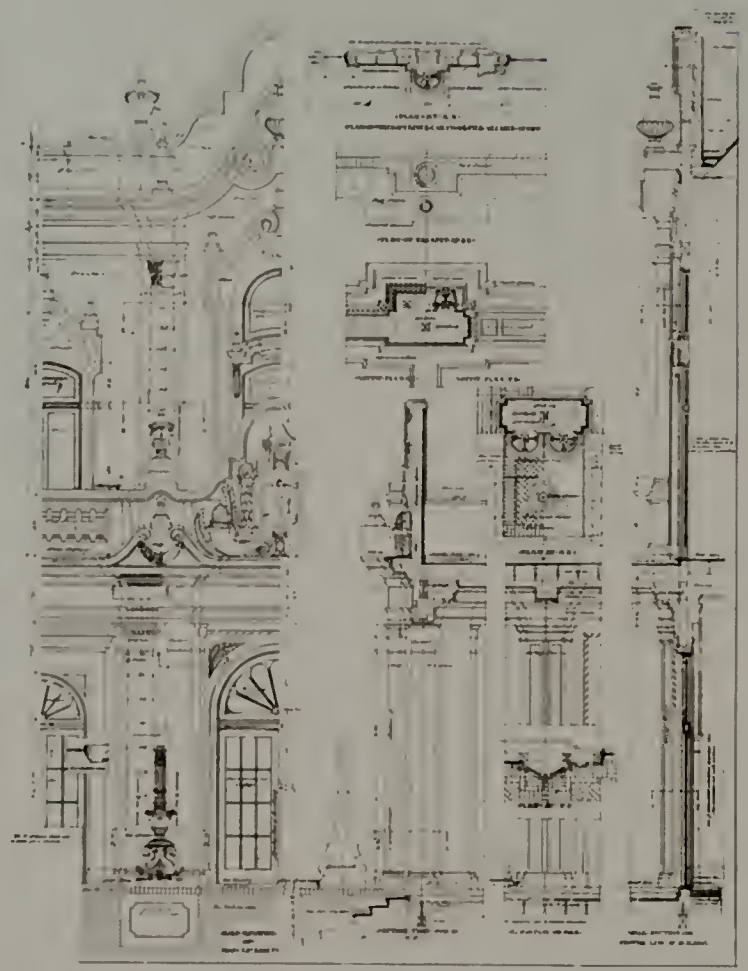
Main Tower Details

Cuban Building, P. P. I. E.

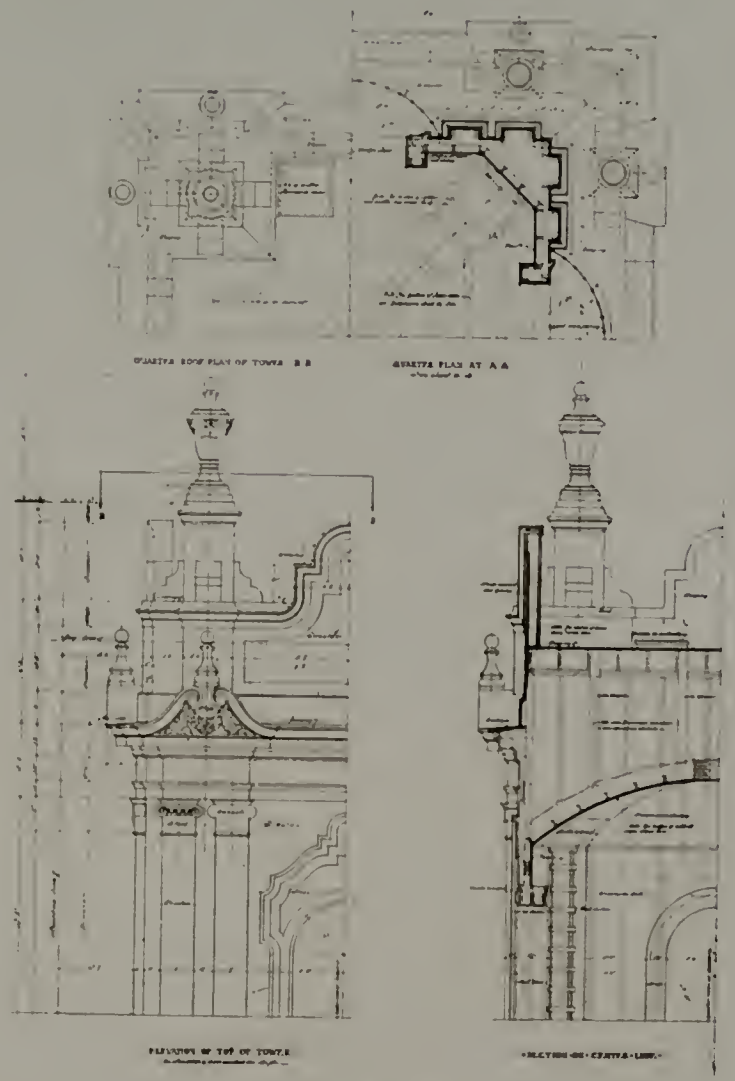
Francisco J. Centurion, Architect, Havana, Cuba



Cuban Building, P.P. I. E. Patio Detail
Francisco J. Centurion, Architect, Havana, Cuba



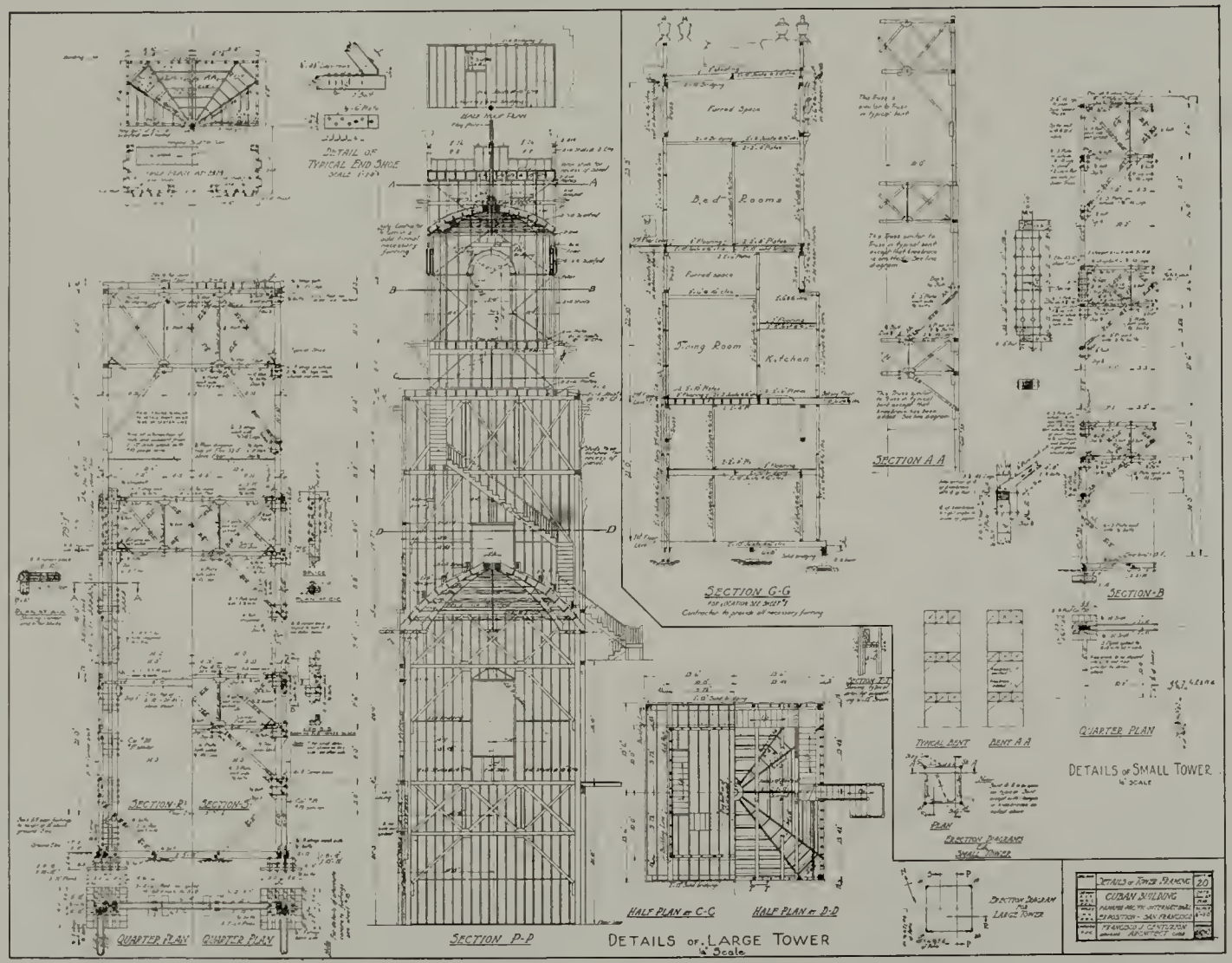
Main Entrance Detail



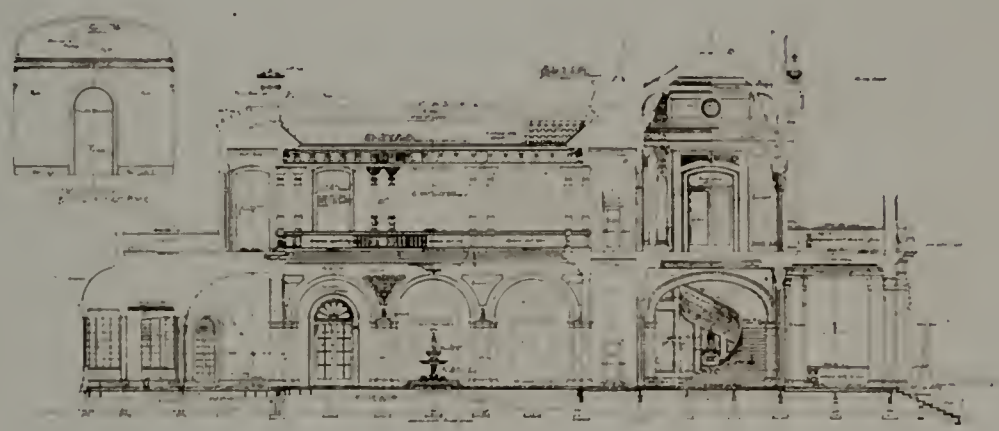
Main Tower Details

Cuban Building, P. P. I. E.

Francisco J. Centurion, Architect, Havana, Cuba

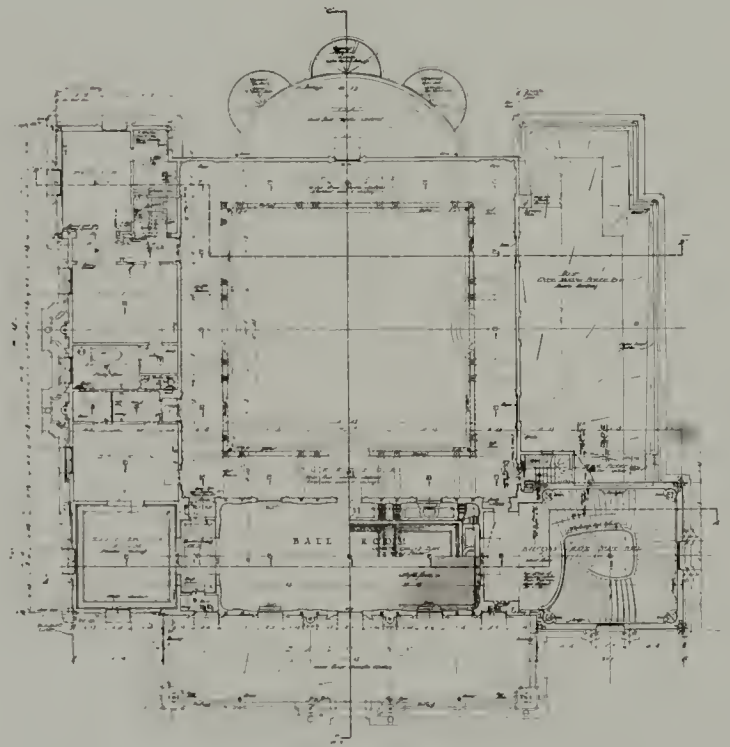


Cuban Building, P. P. I. E. Details of Tower Framing
Francisco J. Centurion, Architect, Havana, Cuba

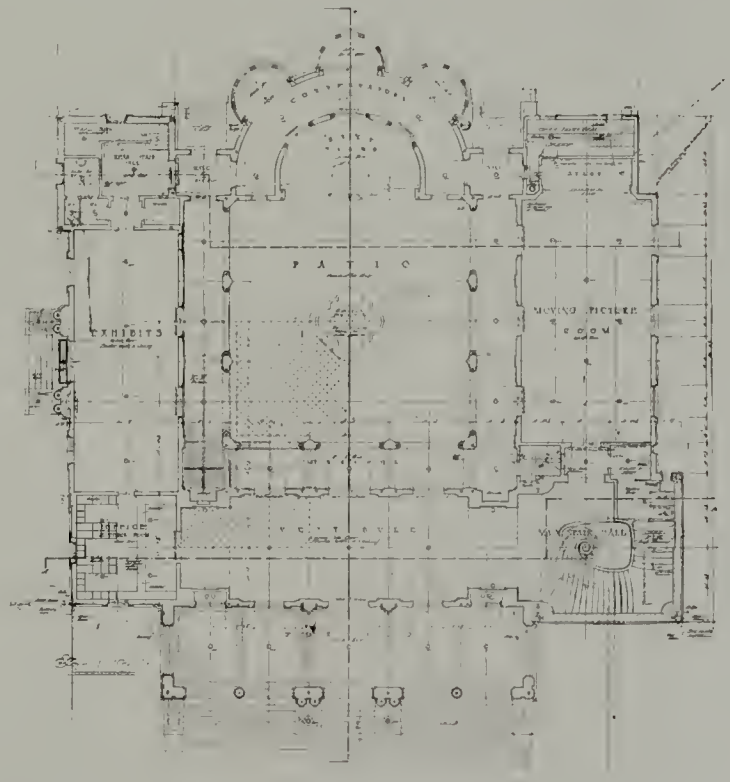


Cuban Building, P. P. I. E. Section C. C.

Cuban Building, P. P. I. E. Section A. A
Francisco J. Centurion, Architect, Havana, Cuba



Second Floor Plan



First Floor Plan

Cuban Building, P. P. I. E.

Francisco J. Centurion, Architect, Havana, Cuba

THE PACIFIC COAST ARCHITECT is the official organ of the San Francisco Chapter of the American Institute of Architects.

San Francisco Chapter, 1881—President, G. B. McDougall, Russ Building, San Francisco, Cal. Secretary, Sylvain Schnaittacher, First National Bank Building, San Francisco, Cal.
Chairman of Committee on Public Information, William Mooser, Nevada Bank Building
Chairman of Committee on Competition, Geo. B. McDougall, 235 Montgomery St.
Date of Meetings, third Thursday of every month; annual, October.

OTHER PACIFIC COAST CHAPTERS OF THE AMERICAN INSTITUTE OF ARCHITECTS.

Southern California Chapter, 1894—Vice-President, A. C. Martin, 430 Higgins Bldg., Los Angeles, Cal. Secretary, Fernand Parmentier, Byrne Building, Los Angeles, Cal.
Chairman of Committee on Information, W. C. Pennell, Wright & Callender Bldg., Los Angeles.
Date of meetings, second Tuesday (except July and August), (Los Angeles).

Oregon Chapter, 1911—President, Morris H. Whitehouse, Wilcox Building, Portland, Ore.
Secretary, Ellis F. Lawrence, Chamber of Commerce Building, Portland, Ore.
Chairman of Committee on Public Information, Ellis F. Lawrence.
Date of Meetings, third Thursday of every month, (Portland); annual, October.

Washington State Chapter, 1894—President, James Stephen, 726 New York Block, Seattle, Wash. Secretary, Arthur L. Loveless, 513 Colman Building, Seattle.
Chairman of Committee on Public Information, Chas. H. Alden, 513 Colman Bldg., Seattle (till further notice send all communications to Arthur L. Loveless, 513 Colman Building, Seattle).
Date of Meetings, first Wednesday (except July, August and September), (at Seattle except one in spring at Tacoma); annual, November.

Colorado Chapter, 1892—President, George H. Williamson, 528 Majestic Bldg., Denver, Colo. Secretary, Arthur A. Fisher, 459 Railway Exchange Building, Denver, Colo.
Chairman of Committee on Public Information, Arthur A. Fisher, 459 Railway Exchange Bldg., Denver, Colo.
Date of Meetings, first Monday of every month (Denver, Colo.); annual, September.

THE AMERICAN INSTITUTE OF ARCHITECTS.

The Octagon, Washington, D. C.

OFFICERS FOR 1914.

President .....R. Clipston Sturgis, Boston, Mass.
First Vice-President .....Thomas R. Kimbal, Omaha, Neb.
Second Vice-President....Frank C. Baldwin, Washington, D. C.
Secretary.....D. Knickerbacker Boyd, Philadelphia, Pa.
Treasurer.....John L. Mauran, St. Louis, Mo.

BOARD OF DIRECTORS.

For One Year.

Irving K. Pond, Steinway Hall, Chicago, Ill.
John M. Donaldson, Penobscot Building, Detroit, Mich.
Edward A. Crane, 1012 Walnut St., Philadelphia, Pa.

For Two Years.

Burt L. Fenner, 160 Fifth Ave., New York, N. Y.
C. Grant LaFarge, 25 Madison Sq., N., New York, N. Y.
H. Van Buren Magonigle, 7 West 38th St., New York, N. Y.

For Three Years.

Octavius Morgan, 1126 Van Nuys Bldg., Los Angeles, Cal.
W. R. B. Willcox, Central Bldg., Seattle, Wash.
Walter Cook, New York, N. Y.

Auditors.

Thomas J. D. Fuller, 806 Seventeenth St., Washington, D. C.
Robert Stead, 906 F Street, Washington, D. C.

SAN FRANCISCO CHAPTER, A. I. A.

The regular monthly meeting of the San Francisco Chapter of the American Institute of Architects was held at the Tait-Zinkand Cafe on Thursday evening, September 17, 1914. The meeting was called to order at 9:10 by Mr. Edgar A. Mathews, Vice-President, in the absence of the President.

Mr. R. E. Smith and Mr. Clarkson Swain were present as guests of the Chapter.

MINUTES.

The minutes of the regular meeting held August 20, 1914, were read and approved.

STANDING COMMITTEES.

None of the Standing Committees had anything to report with the exception of the Educational Committee on Practice. Mr. Smith O'Brien of this Committee stated that he felt embarrassed in asking speakers when there was such a small attendance at the meetings. Mr. R. E. Smith read a very interesting paper on "Illumination from Concealed Sources," and illustrated it with lantern slides. At the conclusion of Mr. Smith's remarks he was voted the thanks of the Chapter.

SPECIAL COMMITTEES.

There were no reports from the Special Committees.

MEMBERSHIP.

Mr. Ernest L. Norberg having made the necessary application for membership and having been balloted upon, Messrs. O'Brien and Headman were appointed tellers to count the ballots. Thirty-three ballots were received and counted and Mr. Norberg was declared unanimously elected to Chapter membership.

At the request of Mr. Albert Sutton, the matter of his resignation was reconsidered and Mr. Sutton, on motion duly made, seconded and carried, was restored to Chapter membership and his resignation laid on the table.

COMMUNICATIONS.

The following communications were received and ordered placed on file:

Communication from Mr. George B. Hollister, Manager of the Pacific Gas & Electric Company, on New Building Law. Letter from Mr. Edgerton Swartwout, relative to building for the Department of Justice, Washington, D. C. Communication from Mr. MacDonald Mayer in regard to Portland Post Office Competition. Communication from Mr. E. C. Kemper in regard to the resignation of Mr. Albert Sutton, and one from Mr. Sutton relating to his resignation. Communications from Mr. Carl F. Gould relating to Architectural Convention in 1915.

UNFINISHED BUSINESS.

There was no unfinished business.

NEW BUSINESS.

In the matter of the communication from the Oregon Chapter, the Secretary was directed to advise the Institute that it was the sense of this Chapter that no action should be taken with reference to the Portland Post Office Competition unless requested by the Institute and to notify the Oregon Chapter accordingly.

In the matter of the communication from the Committee on Government Architecture, the Secretary was directed to communicate with Senators Perkins, Works and Newlands regarding the matter of upholding the attitude of the Institute.

NOMINATION OF OFFICERS.

The next matter of business was the nomination of officers for the ensuing year. The following were placed in nomination in accordance with the By-Laws, and duly declared the nominees to be voted upon at the annual meeting in October:

President, W. B. Faville; Vice-President, John Bakewell, Jr.; Secretary-Treasurer, Sylvain Schnaittacher; Trustees: Clinton Day, Henry A. Schulze and James W. Reid.

There being no further business before the Chapter, the meeting adjourned at 10 o'clock. ♠ ♠ ♠

OREGON CHAPTER, A. I. A.

Held at the Benson Hotel, August 20, 1914.

Meeting called to order by President Whitehouse. Those present were Messrs. Whitehouse, Naramore, Hogue, Beckwith, Tobey, Feuilihoux, Smith, Mayer, Doyle, Jacobberger and Lawrence.

Mr. Naramore moved and Mr. Feuilihoux seconded that the minutes of the last meeting be accepted as printed. Motion carried

REPORTS OF COMMITTEES.

Mr. Whitehouse reported that he had received word from Mr. Lazarus, Chairman of the Special Committee on Contracts and Documents, that he had filed a report of his findings with the Institute Committee.

Mr. Doyle, Chairman of Rose Festival Committee, reported as follows:

FINAL REPORT OF ROSE FESTIVAL COMMITTEE.

Mr. Morris H. Whitehouse, August 19, 1914.
Pres. Oregon Chapter, A. I. A.,
Portland, Oregon.

Mr. President: Your Committee on Rose Festival desires to make a final report as follows on our work in connection with the Rose Festival held in this city.

At one of the last meetings of the Committee, Mr. Mayer was requested to make drawings of a Festival Center and the decorative treatment of the streets, embodying ideas presented sketches by other members of the Committee. This was done and presented with estimates of cost, to the management, through Mr. Woodard, Chairman of the Committee on Decoration.

The original appropriation was to have been $15,000; this was cut to $10,000, then to $7,500, and all work on decoration was held up until the last moment by Pres. Colt on account of lack of funds. They finally spent less than $2,500, we are informed by Mr. Woodard, and he gives this as his reason for dropping the scheme and not taking it up further with us.

Respectfully submitted,
A. E. DOYLE,
Chairman.

There being no objection, the report was ordered filed. Mr. Doyle was instructed, however, to prepare an article for publication, including a reproduction of the Committee's drawings for the Festival Center, showing the activity of the Chapter.

COMMUNICATIONS.

A letter was presented by President Whitehouse from President Gould, of the Architectural League of the Pacific Coast, announcing that the annual Convention will take place in Seattle on October 15 and 16, 1914, and requesting the co-operation of the Oregon Chapter.

A letter from Theodore Hardee, Chief of Liberal Arts, requesting the Chapter to exhibit, was referred to the Educational Committee with instructions to ascertain what other Chapters were doing and report back.

NEW BUSINESS.

Mr. Lawrence submitted a report showing a comparative summary of the sources of study at twenty-four Schools of Architecture in the country, from which averages were established. The course as suggested by Mr. Lawrence for the University of Oregon was given in comparison with these averages. The support of the Chapter was urged for this new School of Architecture. The report was submitted to the Educational Committee.

The Secretary asked for instructions concerning the form of notification and ballot to be sent the members to obtain their choice for Fellowship, according to Mr. Lazarus' motion of the last meeting.

A long discussion followed, during which several members were obliged to leave, breaking the quorum.

It was decided, however, to leave the recommendation to the Executive Committee, which would base their recommendation on the report of a Special Committee to receive ballots on or before September 1st. Mr. Naramore, Chairman; Mr. Hogue and Mr. Beckwith, as members of a Special Committee.

During the discussion it was pointed out that Mr. Whitney's resignation was in the hands of the Chapter. Also that it was unlikely that the Directors of the Institute would recommend for advancement to the Fellowship any new Institute associate members. It was suggested also that every one securing a majority of votes cast should be recommended. This would allow more than one nominee.

Meeting adjourned.

ELLIS F. LAWRENCE,
Secretary.

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SOUTHERN CALIFORNIA, A. I. A.

The Southern California Institute of Architects, Los Angeles, held no meeting during the month of September. The next meeting will be held on October 13, 1914.

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WASHINGTON STATE CHAPTER, A. I. A.

As the Washington State Chapter, A. I. A., does not hold meetings during the months of July, August and September, there will be no minutes of meetings published until October, when they will be resumed.

How a Tin Roof Should be Laid

These suggestions are in accordance with the standard working specifications adopted by the National Association of Sheet Metal Contractors.

Slope of Roof

If the tin is laid flat seam or flat lock, the roof should have an incline of one-half inch or more to the foot. If laid standing seam, an incline of not less than two inches to the foot. Of course, good tin is constantly being used with entire success on roofs of less pitch than this, some of them almost flat, but a good pitch is desirable to prevent any accumulation of water and dirt in shallow puddles. Gutters, valleys, etc., should have sufficient incline to prevent water standing in them or backing up in any case far enough to reach standing seams.

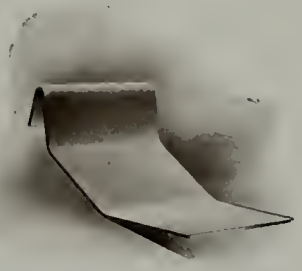

FIG. A.—TIN ROOFING CLEAT
Used for fastening the sheets to the roof boards.

Tongued and grooved sheathing-boards are recommended, of well-seasoned dry lumber, narrow widths preferred, free from holes, and of even thickness.

A new tin roof should never be laid over old tin, rotten shingles, or tar roofs.

Sheathing-paper is not necessary where the boards are laid as specified above. If steam, fumes, or gases are likely to reach the under side of the tin, use some good water-proof sheathing-paper, such as black Neponset. Never use tar-paper.

Seams should be made as shown in the accompanying illustrations. No nails should be driven through the sheets.

Flat-Seam Tin Roofing

When the sheets are laid singly, they should be fastened to the sheathing-boards by cleats (*see Fig. A*), using three to each sheet, two on the long side and one on the short side. Two 1-inch barbed wire nails to each cleat. If the tin is put on in rolls the sheets should be made up into long lengths in the shop, the cross seams locked together and well soaked with solder. The sheets should be edged one-half

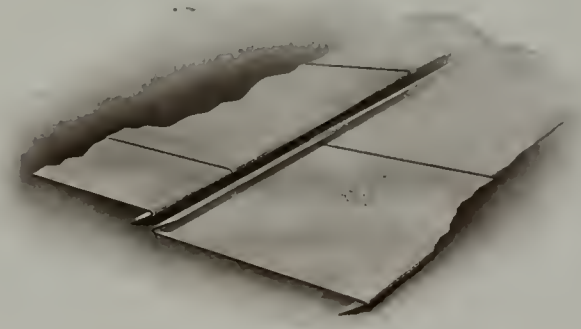

FIG. B.—FLAT-SEAM TIN ROOFING
Sheets of tin put together in long lengths, with edges turned, ready to lay on the roof.

inch, fastened to the roof with cleats spaced eight inches apart, cleats locked into the seam and fastened to the roof with two 1-inch barbed wire nails to each cleat. (*See Figs. B, C, D, and E.*)

Standing-Seam Tin Roofing

The sheets should be put together in long lengths in the shop, the cross seams locked together and well soaked with solder. The sheets should be applied to the roof the narrow way, fastened with cleats spaced one foot apart. One edge of the course is turned up one and a quarter inches at a right angle, and the cleats are installed (*see Fig. F*). The adjoining edge of the next course is turned up one and a half inches, and these edges are locked together (*see Fig. G*), turned over (*see Fig. H.*), and the seam flattened to a rounded edge, as shown in the accompanying illustrations (*Figs. J and K*).

Valleys and Gutters

These should be of IX tin, and formed with flat seams, applying the sheets the narrow way. It is important to see that good solder is used, bearing the manufacturer's name,

FIG. C.—FLAT SEAM TIN ROOFING

Showing method of fastening the tin to the roof. Cleat in position. The adjoining sheet is hooked over this, and the seam hammered down and soldered, locking the cleat firmly into the seam. One end of the cleat is turned over the nail-heads, to prevent them from scratching the under side of the tin.

and guaranteed one-half tin and one-half lead, new metals, using nothing but rosin as a flux. The solder should be well sweated into all seams and joints.

Painting

All painting should be done by the roofer. The tin should be painted one coat on the under side before it is applied to the roof. The upper surface of the tin roof should be carefully cleaned of all rosin spots, dirt, etc., and immediately painted. The approved paints are metallic brown, Venetian red, red oxide, and red lead, mixed with pure linseed oil. No patent dryer or turpentine to be used. All coats of paint should be applied with a hand-brush, and well rubbed on. Apply a second coat two weeks after the first. The third coat to be applied one year later.

Caution

No unnecessary walking over the tin roof, or using the same for storage of materials, should be allowed at any time. Workmen should wear rubber-soled shoes or overshoes when on the roof. Wherever the slope is steep enough, tin should be laid with standing seams, which allow for expansion and contraction.

Maintenance

To keep the roof in good condition subsequent painting will hardly be necessary at shorter intervals than three to five years' time, even longer, depending upon the slope of the roof and upon local conditions.

Since gutters are the natural receptacle for dirt, leaves, etc., they should be swept out and painted every two or three years.

Look over the roof carefully when painting it, to locate and repair any accidental damage.

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Standard Tin Roofing Specification

The following specification has been adapted for architects' use from the Standard Working Specifications of the National Association of Sheet Metal Contractors of the United States. This represents the best practice in laying tin roofs. Architects who have not already done so, will do well to incorporate this in their regular specification forms. Good workmanship and fair treatment are as necessary as good material to get satisfactory results from tin roofing work; hence this specification should be enforced to the letter.

"Tin Roofing Work"

"All tin used on this building shall be N. & G. Taylor Co.'s Target-and-Arrow brand. No substitute for this brand will be allowed. Use IC thickness for the roof proper, desks, etc., and IX thickness for valleys, gutters, and spouts, as required by design. One coat of red lead, iron oxide, metallic brown or Venetian red paint, with pure linseed oil, shall be applied to the under side of the tin before laying.

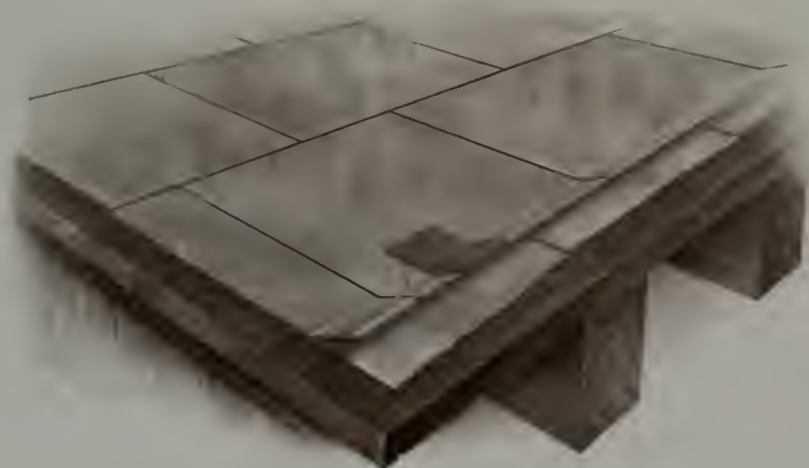

FIG. D.—FLAT-SEAM TIN ROOFING

Showing the sheets in position before seam is hammered down and soldered. One cleat also shown (magnified), with faint lines indicating the various folds of tin in the seam.

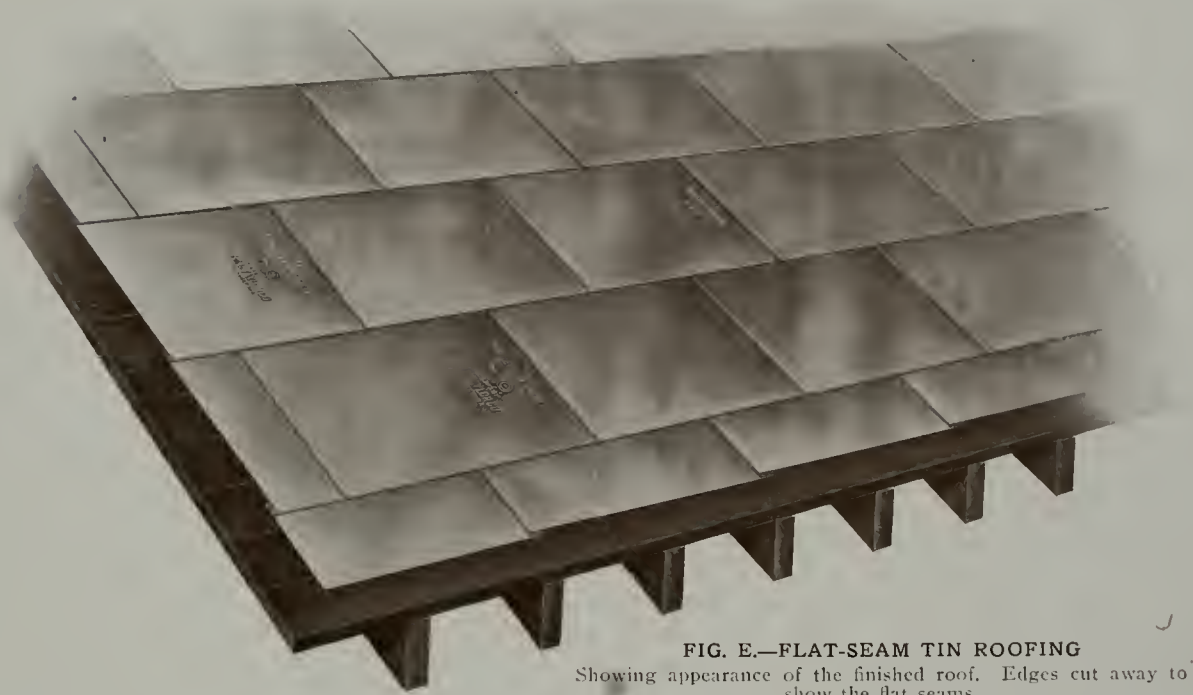

FIG. E.—FLAT-SEAM TIN ROOFING
Showing appearance of the finished roof. Edges cut away to show the flat seams.

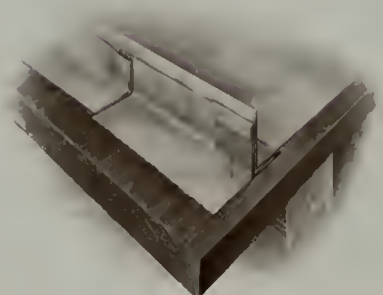

FIG. F.—STANDING-SEAM TIN ROOFING
First operation, showing adjoining sheets turned up at right angles, with cleat installed.

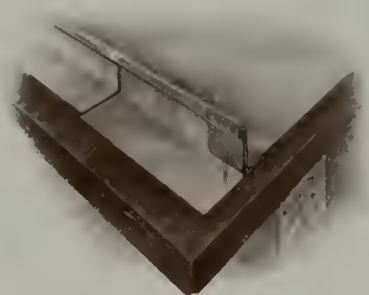

FIG. G.—STANDING-SEAM TIN ROOFING
Second operation. Projecting edge turned over.

"For *flat-seam roofing*, edges of sheets to be turned one-half inch; all seams to be locked together and well soaked with solder. Sheets to be fastened to the sheathing-boards by cleats spaced eight inches apart, cleats locked in the seams and fastened to the roof with two one-inch barbed wire nails; no nails to be driven through the sheets.

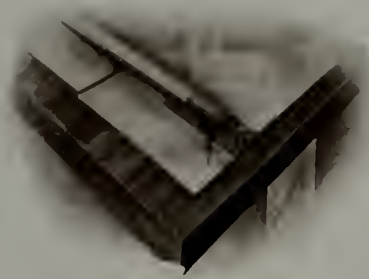

FIG. H.—STANDING-SEAM TIN ROOFING
Third operation. Entire seam turned partly over.

"For *standing-seam roofing*, sheets to be put together in long lengths in the shop, cross seams to be locked together and well soaked with solder; sheets to be made up the narrow way in the rolls and fastened to the sheathing-boards by cleats spaced one foot apart.

"*Valleys and gutters* to be formed with flat seams well soldered, sheets to be laid the narrow way.

"*Flashings* to be let into the joints of the brick or stone work, and cemented. If counter-flashings are used, the lower edge of the counter-part shall be kept at least three inches above the roof.

"*Solder* to be of the best grade, bearing the manufacturer's name, and guaranteed one-half tin and one-half lead, new metals. Use rosin only as a flux.

"*Caution.*—No unnecessary walking over the tin roof or using same for storage of material shall be allowed. In walking on the tin care must be taken not to damage the paint or break the coating of the tin. Rubber-soled shoes or overshoes should be worn by the men on the roof.

FIG. J.—STANDING-SEAM TIN ROOFING
Fourth operation. Standing seam completed, showing cleat in position. Thickness of seam magnified, to show the folds of the metal.

"*Painting tin work.*—All painting of tin work to be done by the roofer, using red lead, iron oxide, metallic brown, or Venetian red paint, with pure linseed oil—no patent dryer or turpentine to be used.

"All paints to be applied with a hand-brush and well rubbed on. Tin to be painted immediately after laying. A second coat shall be applied in a similar manner, two weeks later.

"No deviations from these specifications shall be made unless authority is given in writing by the architect. Only a first-class roof will be accepted."

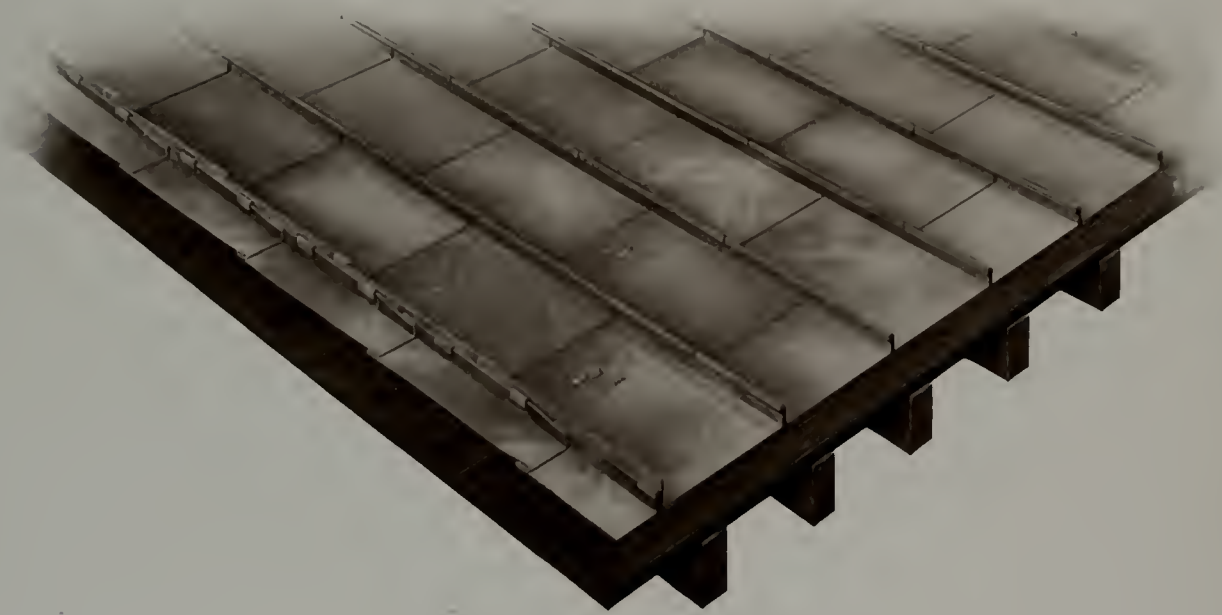

FIG. K.—STANDING-SEAM TIN ROOFING
Showing appearance of finished roof, with one seam unfinished to show application of cleats; thickness of sheets and joints exaggerated in the latter.

INDUSTRIAL INFORMATION

W. P. Fuller & Co. executed a big contract in the installation of glass in the new St. Ignatius Church, San Francisco.

G. C. Kennedy, architect, Everett, Wash., is spending a few weeks in California.

Architect J. J. Frauenfelder, Los Angeles, is permanently located in new offices at 1116-17 Story Building.

S. T. Johnson Co., 1337 Mission Street, San Francisco, installed the oil burners in the new St. Ignatius Church, San Francisco.

Architect O. R. Thayer, formerly located in the Merchants' National Bank Building, has moved to 20 Montgomery Street, San Francisco.

Architect Thornton, Los Angeles, has moved his office from 482 Pacific Electric Building to suite 916-917 W. P. Story Building, Sixth Street and Broadway.

Architect W. C. Pennell, Los Angeles, is now located in his new offices in suite 1303-1304 Baker-Detwiler Building on Sixth Street, between Hill and Olive Streets.

Architects Willis Polk & Co., San Francisco, now occupy their new quarters in the Hobart Building. For a number of years the office of this company was located in the Merchants Exchange Building.

T. F. Howard, architect, Pendleton, Oregon, recently celebrated the fiftieth anniversary of his arrival in Umatilla County. Mr. Howard reached that county from Iowa in 1864 and has resided in Pendleton since 1875.

E. J. Smith, 325 H. W. Hellman Building, Los Angeles, was the only successful candidate to pass the examination allowing him to practice architecture, at the latest examination conducted by the State Board. Mr. Smith has opened offices at the above address.

The United Materials Company, San Francisco, covered the roof of the new Lansdale School, Lansdale, Marin County, with Spanish tile, made by the Los Angeles Pressed Brick Company. Architect J. W. Dolliver, 701 Royal Insurance Building, San Francisco, prepared the plans for this school.

The Frederick Post Co., San Francisco, have on hand a big stock of tracing and drawing papers and pencils, despite the shortage in other sections on these commodities resulting from the curtailment of imports brought about by the war. The company is in the enviable position to fill any order for immediate shipment.

In the last issue of The Pacific Coast Architect we inadvertently attributed the architecture of the Lux School of Industrial Training, San Francisco, to Architect W. H. Weeks, Post Street, San Francisco. Architect William C. Hays, 1325 First National Bank Building, San Francisco, prepared the plans for the Lux School.

Fernand Parmentier, architect, Los Angeles, and secretary of the Southern California Chapter of the American Institute of Architects, was caught in Paris at the outbreak of the war. It was his intention to study European architecture, but it is doubtful if he will accomplish much in this respect owing to the unforeseen conditions.

Architects W. H. Weeks, San Francisco, and Norman F. Marsh, Los Angeles, have been named a special commission by officials of the Panama-Pacific International Exposition to prepare plans for model school buildings to be erected on the exposition grounds. These schools will be a feature of the educational exhibit at the exposition.

W. H. Worden, superintendent of Berry Brothers' San Francisco factory is an enthusiastic sailor. Mr. Worden owns a fast launch, equipped for deep-sea travel. It has sleeping quarters for six, makes nine knots an hour and is a great source of pleasure to Mr. Worden and his friends. Berry Brothers report a very lively business despite conditions of war.

The entire seating for the recently completed St. Ignatius Church, San Francisco was manufactured and installed by R. Brandelin & Co., 3155 Eighteenth Street, San Francisco. The main auditorium will seat 1,700 persons, while the gallery will accommodate 300 persons. The seating of this magnificent church has been pronounced absolutely ideal and in every way appropriate with the surroundings.

The United Materials Company, San Francisco, furnished an interlocking terra-cotta shingle tile, manufactured by the Los Angeles Pressed Brick Company, Los Angeles, for the Nickerson residence, Claremont, Cal. Architect William H. Ratcliffe, Berkeley, prepared the plans for this building. The United Materials Company has also received the contract to cover the roof of the new Southern Pacific depot at Third and Townsend Streets, San Francisco, with mission tile, and the contract for a tile roof on the new postoffice at Hayward, Cal.

Mr. J. C. Bennett, of the S. T. Johnson Company, manufacturers of oil burning equipment, has just returned from the southern part of the State, where he installed oil burners and complete oil-burning equipment for heating and cooking in all the officers' quarters at Fort Rosecrans, near San Diego. These burners are operated from a blower, located at the power plant so that no machinery or apparatus is in the officers' quarters, other than the oil and air pipes which run underground to the various buildings, supplying oil and air under low pressure for operating the burners.

Through the instrumentality of Architect A. R. Denke, Humboldt Bank Building, San Francisco, the Board of Supervisors of that city have adopted an amendment to the Building Ordinances regulating the building of pergolas and yard space on roof of such buildings. At the present time it is declared that fully ninety per cent of the buildings of this class have no provision for such space on the roofs and the occupants are restricted to a small area of yard space in the rear of the building or, occasionally, in a center court. The action of Mr. Denke will mean much to the occupants and owners of flats and apartments in San Francisco.

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Vancouver Civic Center

The committee appointed by His Worship Mayor Baxter invite competitive designs for the development of the proposed Civic Center. Premiums amounting to $500 and $250 will be awarded to the designs placed first and second respectively. The award will be made by independent experts, whose decision shall be final. All designs must be delivered not later than November 30, 1914. Program of competition and plans may be obtained from the Secretary, Vancouver Civic Center Committee, Molsons Bank Building, Vancouver, B. C.

CALIFORNIA

San Francisco—Architect George William Kelham, Sharon Building, San Francisco, has completed plans, which have been approved by the Library Trustees, for a three-story and basement Class A construction library, to be erected for the City of San Francisco in the Civic Center, at a cost of $1,000,000. The plans will be submitted to the Supervisors for their approval. Construction cannot be started until the $900,000 bond issue has been sold.

San Francisco—Architects Rousseau & Rousseau, Monadnock Building, San Francisco, have completed plans for a four-story and basement brick and steel apartment house for the Metropolis Investment Co., to be erected at the northwest corner of Hyde and Sacramento Streets, at a cost of $45,000.

San Francisco—Architects Zanolini & Jewett, 604 Montgomery Street, San Francisco, have completed plans for a four-story and basement Class C construction apartment house, to be erected for Mrs. Mary A. Bradbury, at the northwest corner of Polk and California Streets, at a cost of $47,000.

San Francisco—Architect H. W. Baerresen, Service Building, San Francisco, is preparing plans for a two-story frame and plaster exhibit building for the State of Colorado. It will be erected in the Panama Pacific Exposition grounds at a cost of $40,000.

San Francisco—Architect Houghton Sawyer, Shreve Building, San Francisco, has completed plans for a seven story and basement, Class A construction apartment house, for Mr. Morehead, to be erected at the northwest corner of California and Mason Streets. It will cost $150,000.

Los Angeles—Architects Parkinson & Bergstrom, 1035 Security Building, Los Angeles, have completed plans for a twelve-story and basement Class A steel frame bank and office building, to be erected at the northwest corner of Fifth and Spring Streets, for the F. O. Engstrum Company, at a cost of $200,000.

Los Angeles—Architect John T. Comes, 602 Washington Bank Building, Pittsburg, has forwarded plans for the foundation of the new St. Vincent's Church, to be built at Figueroa and Adam Streets, to Architects Allison & Allison, 1405 Hiberman Building, who will take bids on this part of the work. The building will be of reinforced concrete and will cost $250,000.

Los Angeles—Architect L. L. Jones, 1125 Central Building, Los Angeles, has completed plans for a seven-story and basement reinforced concrete hotel building for C. W. Howard, to be erected at Fifth Street, east of Ruth Avenue, at a cost of about $70,000.

Los Angeles—Architects Train and Williams, 220 Exchange Building, Los Angeles, are preparing preliminary plans for a fourteen-story steel frame hotel building to be erected at the northwest corner of Tenth and Hope Streets for W. J. Pearson. Estimated cost about $800,000. The first two stories exterior will be faced with terra cotta and granite, and the remainder of the structure with tapestry brick and terra cotta.

Los Angeles—Architect Frank L. Meline, 6631 Hollywood Avenue, is preparing plans for a one and two-story and basement brick and steel church for the Fifth Church of Christ, Scientist, to be erected at La Brea and Hollywood Boulevard, at a cost of $100,000.

Los Angeles—Architect E. B. Rust, Title Insurance Building, Los Angeles, has completed plans for a four story and basement brick and steel hotel for Susan Eckley, at a cost of about $37,000.

Santa Barbara—Architect Francis W. Wilson, 717½ State Street, Santa Barbara, is preparing working plans for a two-story and basement Class A construction library building for the City of Santa Barbara at a cost of $50,000.

Alhambra—Architect Norman F. Marsh, 212 Broadway Central Building, Los Angeles, has completed plans for the Alhambra high school building. It will be of brick construction, two stories, and will cost about $100,000, including equipment.

Oakland—Architect William A. Newman, David Hewes Building, San Francisco, is preparing plans for a two-story and basement Class C construction church, to be erected on Thirty-fourth Street near Telegraph Avenue for the Christian Science Church, at a cost of $75,000.

Oakland—Architect Clay N. Burrell, Albany Building, Oakland, has completed plans for a six-story and basement hotel addition for A. C. Aiken, to be erected in addition to the present building at Fifteenth and Jefferson Streets, at a cost of $65,000.

San Mateo—Architect Will D. Shea, 244 Kearny Street, San Francisco, has completed plans for a two-story and basement reinforced concrete lodge hall and store for the San Mateo County Knights of Columbus Hall Association, at a cost of $40,000.

Lodi—Architect E. B. Brown, Yosemite Building, Stockton, has completed plans for a four-story and basement brick and steel hotel, for the Lodi Hotel Investment Company. It will cost about $100,000.

Pittsburg—Architect A. W. Cornelius, Merchants' National Bank Building, San Francisco, has completed plans for a two-story and basement brick school building for the Pittsburg School District, at a cost of $50,000.

Stockton—Architects Stone & Wright, 24 South California Street, Stockton, are working on plans for a two-story and basement brick school building for the City of Stockton, to be erected on Lower Sacramento Road at North Street, at a cost of $75,000.

Roseville—Architect W. H. Weeks, 75 Post Street, San Francisco, has completed plans for a one-story and basement brick and reinforced concrete school for the Roseville School District, at a cost of $40,000.

Lindsay—Architect F. W. Griffin, Visalia, has completed plans for a two-story and basement brick and steel school for the Lindsay School District, at a cost of $80,000.

Van Nuys—Architects Allison & Allison, Hibernian Building, Los Angeles, have completed plans for a two-story and basement brick school for the Van Nuys School District, at a cost of about $57,000.

Berkeley—Architect Eugene K. Martin, 2192 Shattuck Avenue, Berkeley, has completed plans for a two-story and basement Class C construction church building for the First Baptist Church, to be erected at the corner of Dana and Haste Streets, at a cost of $40,000.

OREGON

Portland—Architect Lewis P. Hobart, Crocker Building, San Francisco, has completed plans for a Class A construction post-office for the United States Government, to be erected at Portland. It will cost $1,000,000. The competitive plans submitted by Architect Hobart have been approved. Four other San Francisco firms and one Portland firm were invited in the competition. The design is in the classic style.

Portland—Architects Shepley, Rutan & Coolidge, Boston, Mass., in conjunction with Architect David C. Lewis, Couch Building, Portland, are preparing plans for a bank building, to be erected at Fifth and Stark Streets for the First National Bank and Security Savings and Trust Company, at a cost of about $400,000. The structure will be modeled on the Athenian Parthenon style.

Portland—Architects Tourtellotte and Hummel, Rothchild Building, Portland, have about completed plans for a two-story and basement reinforced concrete school for the First Methodist Church Congregation, to be erected at the corner of Fourteenth and Taylor Streets, at a cost of $45,000.

North Bend—Architect J. E. Tourtellotte, Rothchild Building, Portland, has completed plans for a four-story and basement, brick and steel hotel building at a cost of $100,000.

WASHINGTON

Seattle—Architect Louis Mendell, Oriental Building, Seattle, has completed plans for a six-story and basement reinforced concrete store and lofts for O'Shea Brothers, at a cost of $100,000.

Seattle—Architect George C. Nimmons, People's Gas Building, Chicago, has completed plans for a nine-story and basement reinforced concrete lofts for Sears-Roebuck Co., to be erected at the corner of First Avenue and Utah Street, at a cost of $850,000.

Seattle—Architect J. A. Creutzer, New York Building, Seattle, has completed plans for a three-story and basement brick and steel apartment house for Claude C. Ramsay, at a cost of $85,000.

Tacoma—Architect E. Frere Champney, Henry Building, Seattle, won the award in the architectural competition for drawing plans and preparing specifications for the proposed $100,000 Elks' Building, to be located at Seventh, C and Commercial Streets.

MISCELLANEOUS

New Westminster, B. C.—Architects Gardiner & Mercer, Westminster, are working on plans for a two-story and basement stone and steel court-house building, to be erected in Westminster, at a cost of $70,000.

Edmonton, B. C.—Architects Van Sicklen & Macomber, Alexandra Block, are preparing plans for a seven-story and basement, brick and terra cotta construction office building, to be erected on Jasper Avenue for J. H. Gariepy at a cost of $300,000.

Austin, Tex.—Architect John Eberson, Chicago, is preparing plans for a theater building, to be erected on the site of the present Avenue Hotel, at a cost of $300,000, for Ernest Nalle, Eugene Tips, Wilbur Allen and M. F. Millican, the owners.

The Profession of Architecture

The statement that the medical profession is the noblest of all professions is very frequently heard. The truth of this statement is not doubted. Indeed, work of men in this profession verges often unto a holy work. The names of leaders in the medical profession have been revered by countless thousands. Likewise is the expounding of the gospel of God a truly wondrous work.

The profession of architecture, too, rightfully has a claim to rank with these noblest of all professions. Noble architecture has done its part in inspiring good; its comprehension has instilled lessons that are both lofty and enduring, for it is a gift to the ages, planted in the sight of all. The architect has problems of high import, for he himself must know of physic; and, perchance, of sermons. Homes constructed on a sanitary basis make for a sanitary city and a better and more healthful community. The effect of a building constructed on a sanitary basis is very marked on the occupants of such a building. It provokes a spirit of cleanliness, undeniably.

When the architect is well fitted for his calling, his profession is surely a delightful one. In a comparative sense his work is considerably less tedious than that of the doctor. His is the well-balanced and full life. His work calls for a free exercise of all man's facilities; physical as well as mental. His artistic sense is always encouraged, as well as his scientific mentality. The architect has his knotty problems to contend with; they are always cropping up in the construction line.

The architect calling, taken as a whole, is so vast that it is impossible for one man to take it all in or to absorb to advantage. The best in this profession must need impose limitations upon himself. No one man can do everything and anything well. However, even though there are specialists in the profession of architecture, architects are something more than specialists in the strict sense of the word. An architect is more than a creator of buildings when one considers the many and various duties involved.

In the first place the architect must be a salesman to get business; he must be a designer of whole townships; he must be a superintendent of construction and an arbitrator of disputes pertaining to construction; he must be a landscapist; his eye is trained for selection of sites; he must be a mathematician, a specialist in laying out special equipments and, furthermore, the architect must be able to put all such mental impressions thus obtained on paper, be it in a readable text or with drawings or reproductions in water color. The aspiring architect will at once appreciate the necessity for a well rounded education before he can hope for success in this line.

As regards to specialization in the profession of architecture, assuredly its exponent is a specialist on numerous subjects in the accumulation of data for any given endeavor. Exhaustive investigations, in which the architect delves into subjects entirely divorced from his profession are necessary. In the construction of certain types of buildings the conscientious practitioner of architecture must do considerable researching, collecting and tabulating data, inspecting all kinds of edifices and out of these all he must evolve particular details of the problem.

Imagination, of course, is a chief factor of cultivation by the architect. The young architect who has imagination that will not outrun discretion and sound sense has, indeed, a wondrous gift. It is a solver of many problems. To give the correct solution in such cases as they arise is fitting evidence for fitness.

Competitive prizes are a great stimula to the imagination, and in this respect are appreciated quite widely. Competitive architectural competitions have been pretty generally condemned, but they are a decided asset in bringing experience to the young architect.

Much has been written on the subject of architecture, but not so much about the architect. This work has been called an art, science, business, craft and profession. It is really a combination of all, but more truly a profession than anything else. It is a profession no less than medicine or law.

The fees of an architect have been compared with the fee of a doctor or a lawyer. Herein lies much of the trouble and vicissitudes incident to the practice of architecture. In the first place the layman has, for years, strenuously objected to the payment of just fees for this sort of work on the grounds of it being something altogether too intangible to pay out good money for. To the eyes of this class of people an architect's work is naught but a flimsy thing of no value. It might be said that this view is most generally taken upon completion of their building.

In the matter of architect's fees there has also been considerable discussion within the ranks of the profession itself on what constituted an equable arrangement of prices; and there is room for such discussion for it is an accepted fact that most architects are underpaid despite the protestations of some of our friends among the laity.

In every age there are those practitioners who are especially favored; a few whose clientele is composed of the very rich, whether individuals or corporations, and who, seemingly, care nothing about the cost of a building or the size of the architect's fee. Such architects are surely blessed; prosperity is theirs for the asking, but their numbers are small. These men may not be especially more fitted than many of their fellow workmen, but fortune usually smiles to them through opportunity, or some process of natural selection. At any rate they are called the leaders of the day. When a man rises to such position he has small need to wish for or seek a change in conditions.

The great diversification of an architect's work has caused the confusion, resultant in an attempt to define it. The several dictionaries all differ somewhat in their definitions. The late John M. Carrere said, "An architect is a gentleman, an artist and a man of affairs."

The official definition of an architect, as defined by The American Institute of Architects, is:

"An architect is a professional person whose occupation consists in originating and supplying artistic and scientific data preliminary to and in connection with the construction of buildings, their appurtenances and decorations; in supervising the operations of contractors therefor; and in preparing contracts between the contractors thereof."

In the states of California, Illinois and New Jersey, administrative officials have constructed their special definitions of an architect's duties, which are regulated in accordance. At the present writing one of two other states have framed similar bills.

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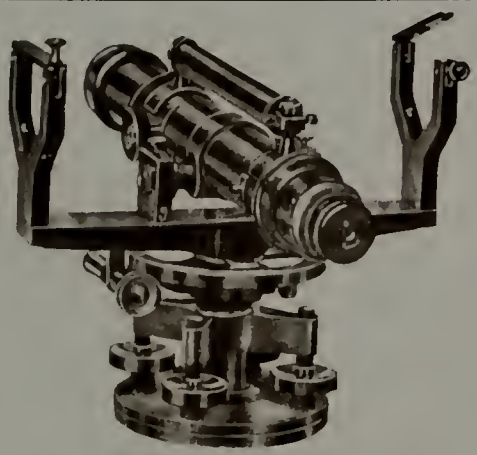

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VOLUME EIGHT
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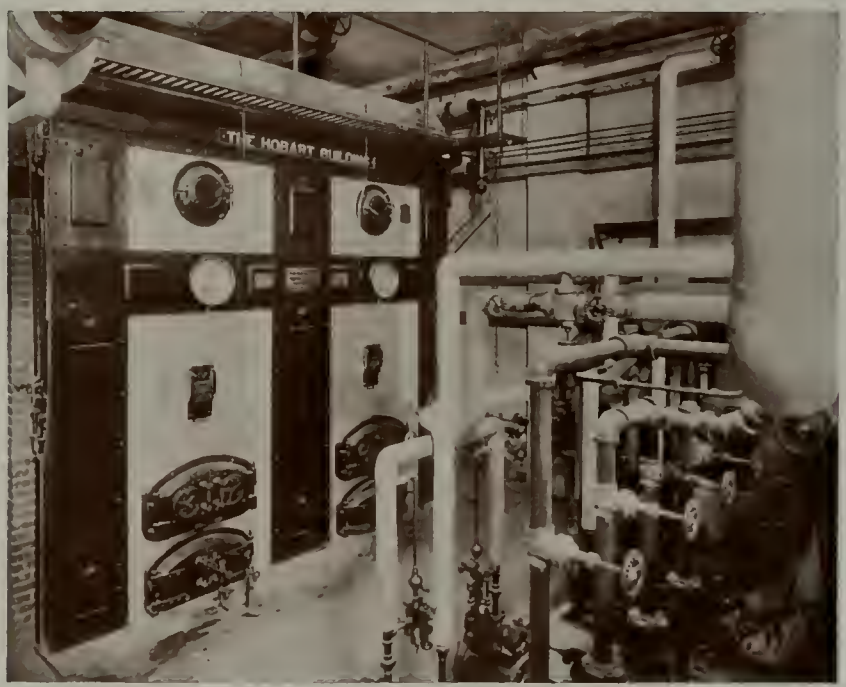

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VOLUME VIII — SAN FRANCISCO, CALIFORNIA, NOVEMBER, 1914 — NUMBER 5

THE PACIFIC COAST ARCHITECT

J. A. DRUMMOND - - - - - - - - - Editor and Publisher

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Changes in, or copy for new advertisements must reach the office of publication not later than the Fifteenth of the month preceding issue.

The Editor will be pleased to consider contributions of interest to the readers of this publication. When payment for same is desired this fact should be stated. Self-addressed envelopes must accompany all such contributions.

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EDITORIAL

The War Versus American Industry

For the past five or six weeks there has been a subject of absorbing interest to the citizens of the United States and that is: What effect will the war have on the industries of this country? How will the gigantic struggle affect business?

There has been talk of increased cost of living; the closing down of mills; the paralysing of all new development; the taking away of the means of subsistence of hundreds of thousands, the suspension of building and so on down the line of pessimism.

Present and actual results—well, that indeed is another story. One thing is certain—those pessimists have been routed. The world has not come to an end and most of us are still able to get three square meals a day.

While it may be true that certain lines of endeavor have suffered, on the other hand many phases of industry have prospered. The outstanding features of how the war has helped this country is seen in the tremendous sales of automobiles, horses, and other supplies, to the warring nations, the resumption of activities in long-stilled factories to supply domestic demand threatened by the stoppage of importations, and, and of far-reaching importance, the opening of wonderfully rich trade fields in South America.

The results of the European conflict on American industries will not be determined today, nor for many a day. Anyone attempting to make such a prophecy will make a mistake. In the meanwhile, however, let us get together and not lose sight of any opportunity that may present itself. Such opportunities should be embraced at once and made permanent factors in the business life of this nation; they should not be allowed to slip through our hands upon the cessation of hostilities and revert to former fields. If we accomplish this much we shall be making headway and American industry need have no fear that the war will bring on a deluge of hard times—as the pessimist would have you believe.

Bungalow Building in California

California easily leads in the production of the ideal bungalow, not only in quantity but in quality. In the building of this class of bungalow it has been well said that "California leads—others follow."

However, there are reasons for the above statement, generally well known. In the first place the equable climate of California particularly lends itself to the adaptation of the bungalow as a means of dwelling and, as a result thereof, California architects do not have to face the many and complex obstacles that might be said to face designers of such dwellings in other parts of the country. It is not necessary, as is the case in other sections of the country to plan particularly and specifically for preservation against the elements, most often to the detraction of value judged from an artistic standpoint.

Then again the rich and varied coloring of California landscape offers an excellent background, and blends to admirable advantage with the many-colored hues, now so popular in exterior finishes of many of the newer types of bungalows.

Assuredly the California architect has decided advantages over his fellow worker of other climes, when it comes to building bungalows and, for this reason, it is not the idea of the writer to imply that he is especially better fitted for the task than the co-worker located elsewhere. The facts are that the California architect's natural facilities are a thousand fold better and more agreeable than those confronting the builder elsewhere. That these natural facilities have been appreciated and taken advantage of is readily attested by California building.

California bungalows might be said to have a style peculiarly their own, but, notwithstanding, the type of construction has been copied quite extensively in certain sections of the Eastern States. This statement may sound fallacious but its verity is vouched for by authorities, not only within the State of California, but in the East as well.

♠ ♠ ♠

Important Experiments Consummated

The engineering experiment station of the University of Illinois recently issued a bulletin giving the results of six years' studies on the best methods of correcting acoustical defects of auditoriums. The auditorium of that institution was used for the purpose. Echoes were located by means of an alternating current arc light, a beam from which, accompanied by the hissing sound of the arc, was directed to various parts of the room. The paths of the light reflection were traced and verified by the sound. This plan within the auditorium itself, followed by careful studies in the laboratory, served to correct the acoustical properties of this school auditorium which, at the start, were pronounced very wretched.

The Chronology of an Office Building

"In time of war prepare for peace," or to paraphrase the saying of another great man, come all ye who listen with credulity to the whispers of fancy and pursue with eagerness the phantoms of hope, who expect that age will perform the promises of youth, and that the deficiencies of the present day will be supplied by the morrow, at-

Skyline of buildings in San Francisco built since 1906 by Willis Polk & Co. The Hobart Building in the center.

tend to the history of the construction of a modern office building!

When it is remembered that San Francisco, situated as it is upon the western edge of our continent, is at a disadvantage in point of time of from six to eight weeks, in the delivery of structural steel, the added freight cost thereof, lapse of time in transit, and loss of time in exchange of information, shop drawings and other details, then the record herewith presented equals, if it does not excel, that of similar performances in the East.

The rapid construction of an office building usually impresses the public as being something little short of marvelous, but a glimpse behind the scenes would soon convince the public that the most marvelous thing in modern construction would be a lack of rapidity in progress.

In the construction of the Hobart Building just completed in San Francisco the following schedule of dates, giving its chronological history, may be of interest:

May 24, 1913—Hobart Estate Co. decide to build.
July 3, 1913—Preliminary plans adopted.
Oct. 2, 1913—Working plans completed.
Nov. 26, 1913—Financial plan accepted.
Dec. 2, 1913—Contract signed for structural steel.
Dec. 18, 1913—Contract signed for excavation and foundation.
Jan. 16 to 26, 1914—Balance of contracts signed.
Mar. 14, 1914—Erection of steel commenced.
Aug. 31, 1914—First tenant moves in, five and one-half months from commencement of erection.
Nov. 1, 1914—Building completed, eleven months from date of first contract.

The construction of this building occasioned much comment and some criticism, it being alleged that it was conducted in a reckless manner, one critic expressing the opinion that no greater crime against the public had ever been committed. In reply to one of these complaints the Architects advised the Hobart Estate Company that the City Building Department, the Fire Marshal, and the State Industrial Accident Commission, had all expressed their satisfaction at the unusual care that had been exercised and at the precautions that had been taken to guard against accidents.

The inside history of this apparently remarkable performance is here given:

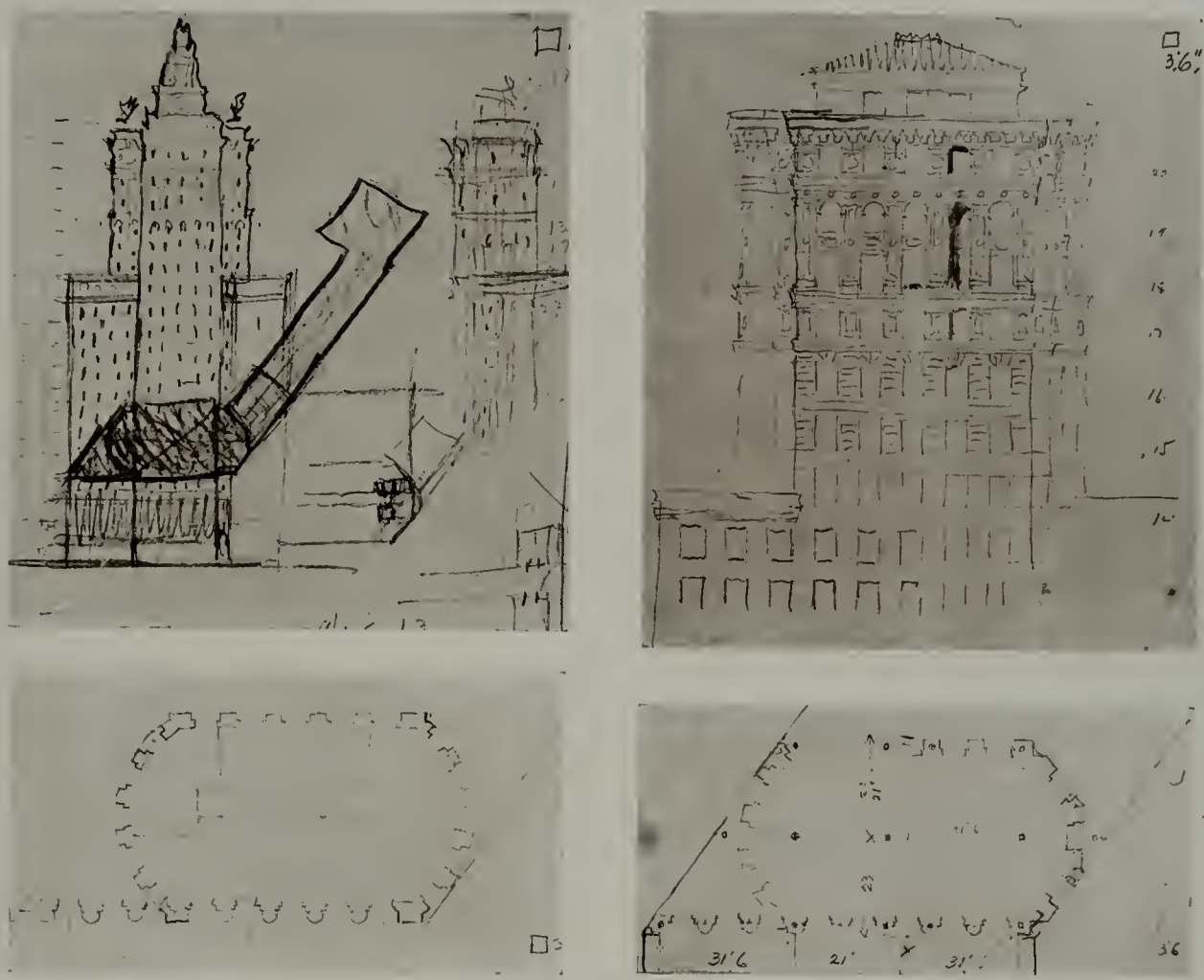
For example, during the construction of the building, owing to its great height, and the high winds then prevailing (during March and April), every effort was made to prevent liquid concrete from blowing over adjoining streets. Canvas protections and guards were erected, the winds tearing these guards as fast as erected, away from the windward side of the building over the edge of the other side of the building for a distance of blocks, and, in stripping concrete forms, many chips and small pieces of scantling were lifted by the winds and carried away. The blowing off of workmen's hats was so frequent that

FROM "A STREET IN SAN FRANCISCO."
DRAWN BY WILLIS POLK.

Pen-and-ink sketch of Market Street drawn in 1910 by Mr. Polk. The old Chronicle Building, the old Palace Hotel and the old Hobart Building are shown in this sketch

small boys in adjacent streets did a thriving business in recovering same.

In view of the complaints made, it might be observed that the record of actual accidents on this building were



The above are from Mr. Polk's original studies on quadrille paper. During these studies Mr. Polk came to the conclusion that it would be just as cheap to build 21 stories on the Market Street end of the property, as it would be to build 12 stories through to Sutter Street. By this decision the Sutter Street end of the property was reserved as an unimproved asset, and the tower offices, being more desirable, commanded higher rentals.

far below the average of such accidents on buildings in general. Therefore, it should not be assumed, the Architects claim, that any carelessness existed, or that any accidents ensued on account of, or traceable to, efforts that were made to complete the work without interruption.

Rapidity or speed seemed to have been employed in excess, but as a matter of fact no undue haste or speed were employed. It should be remembered that the energy of the workmen engaged and their ability for accomplishing their given tasks was no greater than that of men employed on buildings in general, nor greater than such men usually possess.

In other words, rapidity in construction did not represent the inordinate ambition of the Architects, unmindful of the lives and limbs of other people, to hurry things; but represented on their part a practical demonstration of the value of a pre-conceived scheme of construction, all elements thoroughly co-ordinated. Under such a method no interruption in progress was expected. When no such interruption occurred, rapidity of construction seemed to ensue. The answer is simple—early final completion was achieved not by rapidity in construction but by steadiness of progress.

Equally important, it should also be noted that from the investment or financial point of view, the construction of this building also appears to have been something wonderful. At first, a twelve-story building covering the entire property, which extends through from Market Street to Sutter Street, was proposed. It was found that such a building, containing many interior, therefore less desirable rooms, would cost as much as a twenty-two story building covering half the lot with many exterior or more desirable rooms. In other words, for the same capital investment a higher rental value was obtained and the Sutter Street end of the property retained for future improvement.

Also, the development of the tower idea, i. e., a tall building on an inside lot, resulted in the production of a symmetrical skyline, an effect not ordinarily obtained in a building on an inside lot. In studying the elevations of this building, the evolution of the tower idea led to the elimination of any special treatment of the Market Street front, between the lower stories and the upper stories.

Pencil drawing by Mr. C. K. Bonestel, Jr. This drawing made before the construction of the building may be favorably compared with a photograph of the building in the opposite column taken from the same point of view

On account of the height of this building it was thought that it provided office space in excess of market requirements; that it would tend to depreciate the office market; in other words, that this building could only be fully occupied at the expense of other buildings. This promise cannot be maintained when it is remembered that the entire office space in the Hobart Building represents less than one per cent of the total existing office space already occupied in this city. If no allowance, whatever, be made for an increased demand for office space, the tax on other buildings in this case will not exceed one per cent; therefore anyone lacking confidence in the future of San Francisco, or unduly influenced by the prevailing financial and business depression, or in ignorance of the above facts, should, before discouraging the construction of buildings of this character, remember that the pessimist never builds, whereas the optimist does.

Perhaps the most notable facts in connection with this building are that its final cost is about one thousand dollars less than the original estimate, and that its completion was accomplished within a previously-fixed, specified time. This final cost includes nearly $100,000 worth of betterments not contemplated at the time the original estimate was made. It also includes the deduction from the contract price of about $55,000 worth of items that were not required or necessary for successful construction and finish; for example—while the original plans showed concrete soffit fireproofing of the structural steel beams, such fireproofing of the beam soffits was omitted in the contracts, and lath and plaster fireproofing substituted therefor at a substantial saving in cost.

This substitution led to Mr. Polk's famous controversy with the Building Department and the mayor of the city. It seems that the Building Department, noting that the original plans showed concrete soffit fireproofing, undertook to insist that such concrete soffit fireproofing should be installed in the building. Mr. Polk called to their attention the fact that the building law did not require concrete soffit fireproofing, but permitted lath and plaster soffit fireproofing.

The misunderstanding that arose therefrom afforded much amusement and lent some doubt to the readers of the daily press. It is needless to say that the Building Department could not compel the Hobart Estate to put in concrete soffit fireproofing and that they finally accepted lath and plaster as provided.

Now, as to concrete fireproofing of beam soffits versus lath and plaster fireproofing, it does not follow that concrete fireproofing is better because it is more expensive; on the contrary, while lath and plaster fireproofing is cheaper, Mr. Polk contends that it is better, for the reason that concrete fireproofing of beam soffits will directly transmit heat waves to the structural steel,

PHOTOGRAPHIC VIEW OF HOBART BUILDING.

whereas lath and plaster fireproofing of beam soffits with its air spaces interrupts such transmission of heat.

Years ago concrete fireproofing not only of beam soffits but of all structural steel members, was considered as vital not only to the fireproofing of steel, but also to its

protection against corrosion. It was thought that by hermetically sealing steel in concrete, no corrosive action detrimental to the structural integrity of a building could ensue.

The fires which destroyed the cities of San Francisco and Baltimore revealed many conditions of a practical nature that theretofore had remained in the field of purely theoretical conjecture. These led Mr. Polk, so he informs us, to the following conclusions:

First--That the sealing of structural steel hermetically was not essential.

Second—That concrete soffit fire protection was detrimental rather than beneficial.

Third—That concrete floor construction, including the haunches of the beams, had, in addition to its mere fireproof qualities, an element of structural strength. While the building law in general makes no allowance whatever for such element of added strength, practice has demonstrated that concrete so employed adds materially to the strength of the beams. It is, therefore, economical in principle and when intelligently employed, produces a material saving in the cost of a building.

This controversy between the Architects and Building Department directed the general attention of the public to the construction of this building so that it received closer scrutiny and more general inspection than such buildings usually receive. The Architects naturally invited inspection from all sides, especially from hostile sources, and it must be said that they succeeded in purchasing considerable free inspection.

In the design of this building many unique and original problems were encountered; for example, under the charter of the city of San Francisco, it is not permitted that any base course or other detail project beyond the street line. Ordinarily, in such an entrance as that to the Hobart Building, either the face of the building would have to set back from the street in order to permit of the projections of the architrave around the entrance, or else such projections would have to be omitted. In this case the Architects not only maintained the face of the building at the street line, but succeeded in creating the impression of a projecting architrave by simply sinking same into the surface of the building, preserving appearances in all respects.

Again the regulations of the Post Office Department are extremely inflexible regarding the installation of mail chutes; for example, the mail chute must extend continuously in a vertical line f the top to the bottom of the building. In this building it was found that on account of structural beams that the only possible location of the mail chute on the upper floor would be out of symmetry in the main entrance vestibule where it was desired to maintain an artistic effect. It being impossible to move the mail chute over on the upper floors on account of the beams, it seemed that the artistic effect in the main entrance vestibule would have to be sacrificed. This difficulty was overcome at last in the most simple manner. The solution consisted merely of concealing the mail chute behind the ornamental marble finish of the vestibule and enlarging the size of the chute so that without interrupting its perpendicularity the exposed glass face of the chute could be placed in the symmetrical artistic center of the marble pilaster.

Further, in most buildings, overhead machinery, smoke stacks, steam exhaust, and vent pipes, are permitted to disfigure the sky line. In the case of the Hobart Building, without additional cost, all such overhead necessities were artistically treated if not entirely concealed as is shown on the elevations and structural diagrams published herewith.

Old Hobart Building, on the site of the new building. Mr. W. S. Hobart, California pioneer, and founder of the Hobart Estate, purchased this property, it is said, for the reason that it faced on Market Street at the head of Second Street. At that time Second Street was the principal street of the city, and the vista from Rincon Hill looking northeasterly along Second Street made the Hobart Building the most conspicuous object to be seen.

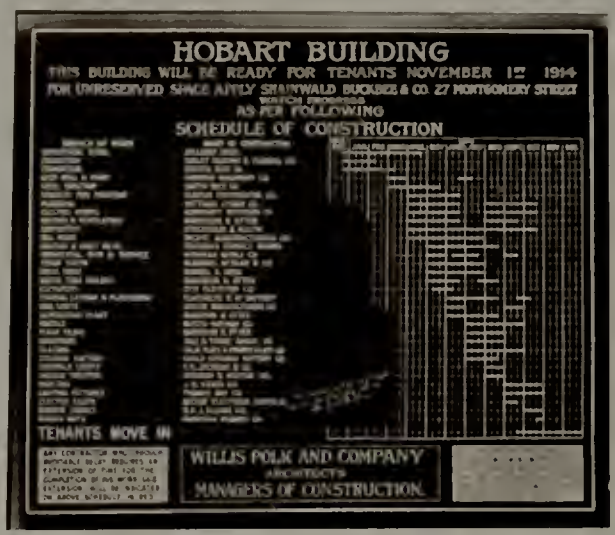
This building is also unique in that it is entirely independent of the public water service or the outside gas or electric service, the building being equipped with its own storage battery, motor generators, and deep well

pump. Light, heat, power, water, and ventilation is entirely provided from within.

The mechanical equipment of the building includes a complete independent steam and electric generating plant together with an electric storage battery for the furnishing of the night service and the carrying of peak loads. Steam is generated in two high pressure water tube safety boilers and supplied to two 35 k. w. General Electric steam turbines, direct connected to 250 volts electric generators. The storage battery is designed to float on the line and provided with motor-driven booster and regulator to hold a predetermined even output on the generator.

Exhaust steam from the turbine and auxiliaries is circulated by means of a wet vacuum return system for the heating of building and hot water supply.

Architect's perspective drawing of final design. Photograph of building as executed shown on opposite page. As a rule perspective drawings look but little like the executed work. In this case these illustrations speak for themselves.



There is installed a motor-driven deep well pump and well for the independent supply of water for flushing purposes.

Hot and cold water is supplied to all basins, the height of the building requiring for economical operation the installing of two independent pressure systems. A separate 5,000-gallon roof tank supplies water for fire department hose reels throughout the building.

The elevator service of building is furnished by three high-speed ball-bearing electric traction passenger elevators equipped with full flash light system.

In building construction, all of the work is, as a rule included under one general contract, the general contractor dealing directly with the owner and the Architect, while the thirty-five odd sub-contractors deal only with the general contractor. This method being usually preferred for the reason that it is supposed that the general contractor not only has a superior advantage in purchasing and managing, but that he can control and direct the various sub-contractors to advantage.

On the other hand, Willis Polk & Co. have made it a practice, in addition to their regular duties as Architects, to absorb and perform all the functions of the general contractor. This they claim has eliminated considerable friction and has resulted in great savings, all advantages and savings accruing directly to the owner.

Co-ordination of effort, and rapidity of construction under this system is more easily attained. Sub-contractors, especially the more reputable ones, are enabled to complete their work in a shorter period of time, and consequently may engage at closer terms under such a system, with more certainty of early completion and final payment.

No addition to, or deduction from the work, is ever ordered unless agreed upon by the contractor, owner and Architect, and set forth in writing, and no payments on account are ever otherwise made. This rule rigidly enforced prevents disputes; final payments are the easiest payments to be made as there remains absolutely nothing to be audited or adjusted.

In the case of the Hobart Building, the Architects desire to express their keen appreciation of the uniform co-operation of the high-class firms who participated with them in the completion of this work. This includes all of the thirty-five contractors engaged, with perhaps but one exception.

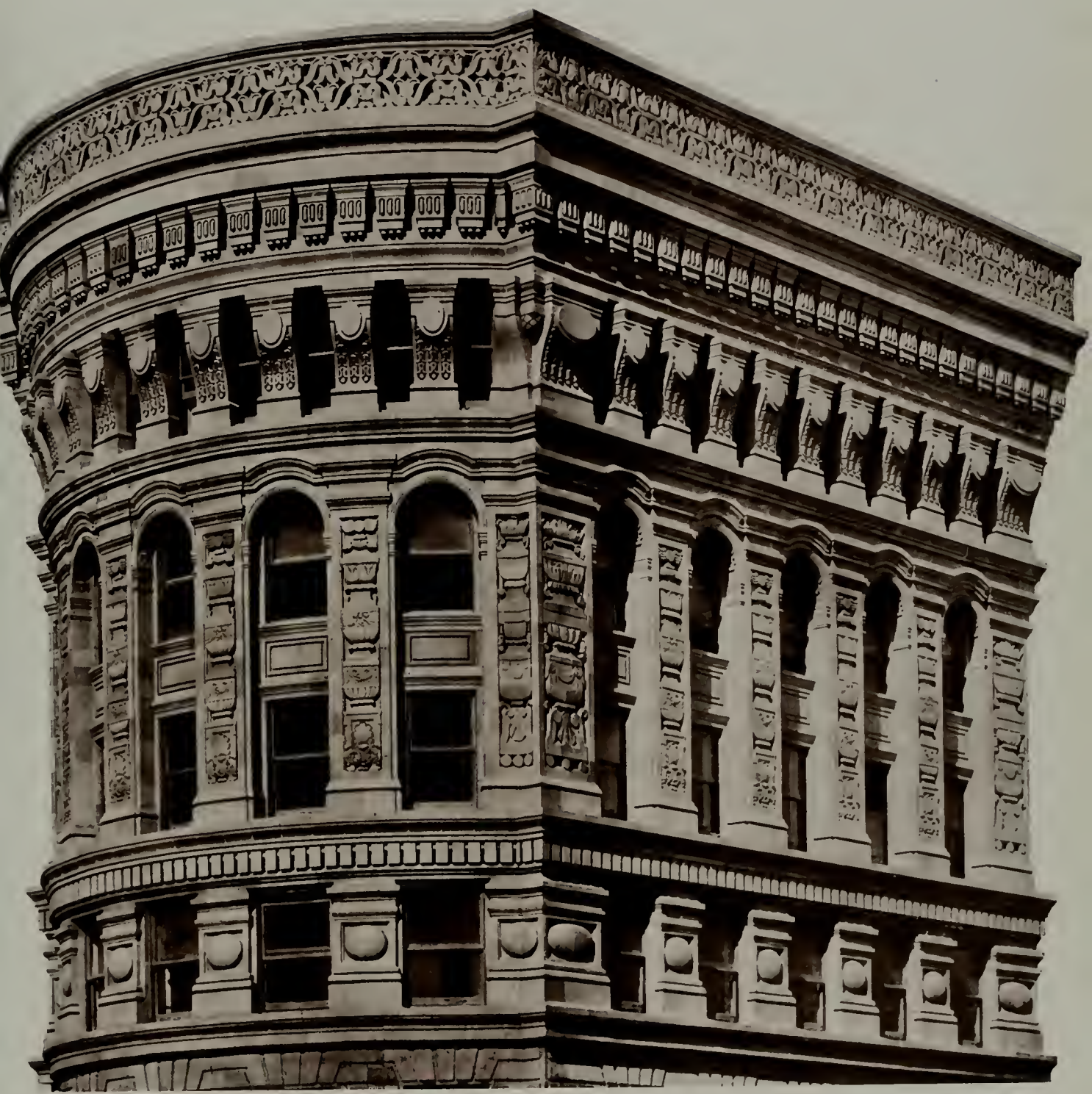
(Continued on page 205.)

Hobart Building, San Francisco
Willis Polk & Co., Architects, San Francisco

Photo, Gabriel Moulin

Detail of Tower, Hobart Building, San Francisco
Willis Polk & Co., Architects, San Francisco

Photo, Gabriel Moulin

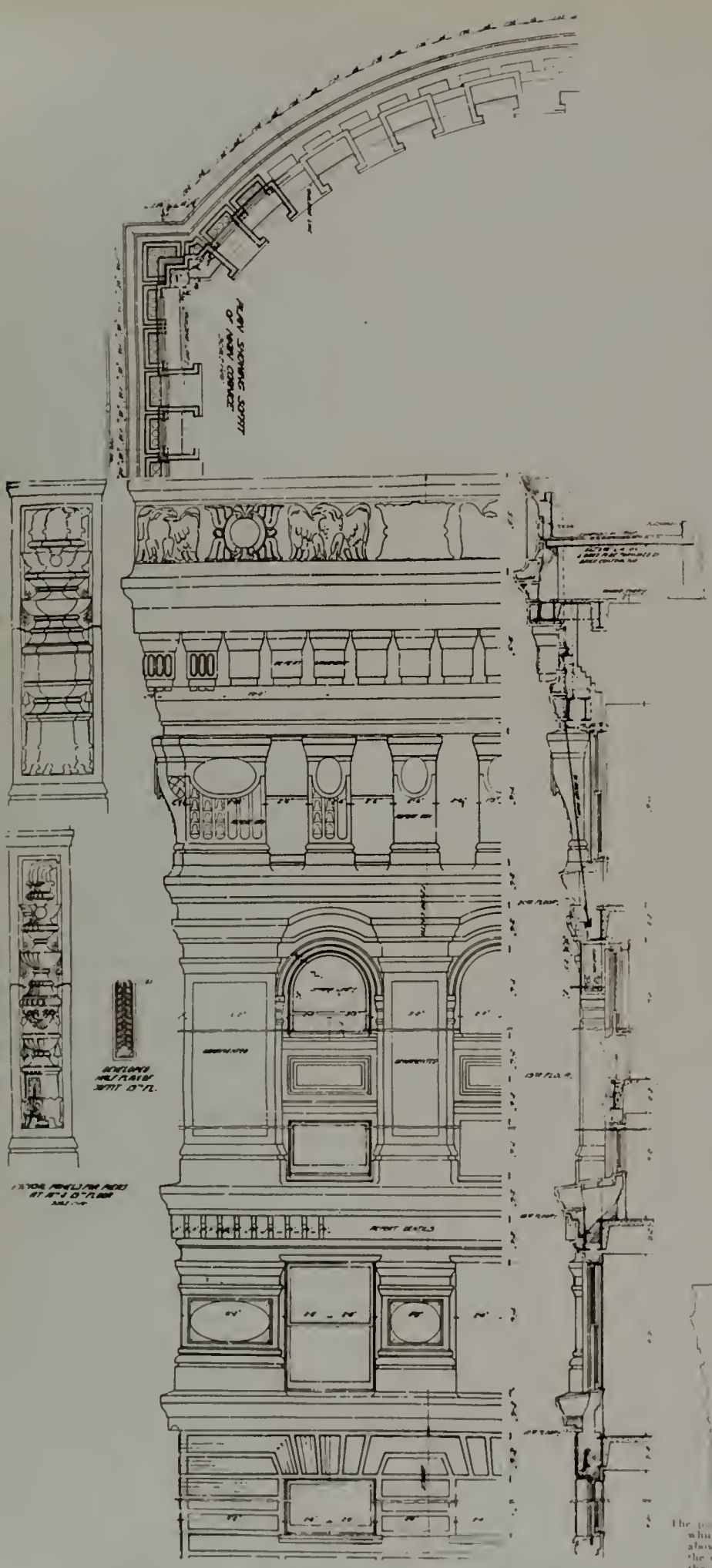


Detail of Upper Stories, Hobart Building, San Francisco
Willis Polk & Co., Architects, San Francisco

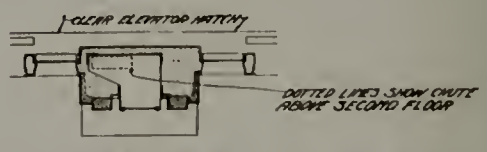
Photo, Gabriel Moulin

Main Entrance, Hobart Building, San Francisco
Willis Polk & Co., Architects, San Francisco

Photo, Gabriel Moulin

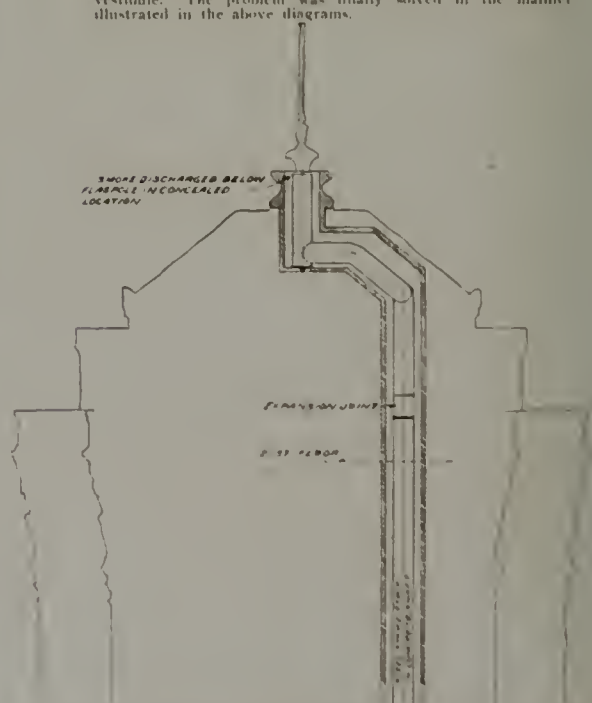


Detail of Upper Part of Tower, Hobart Building, San Francisco
Willis Polk & Co. Architects, San Francisco

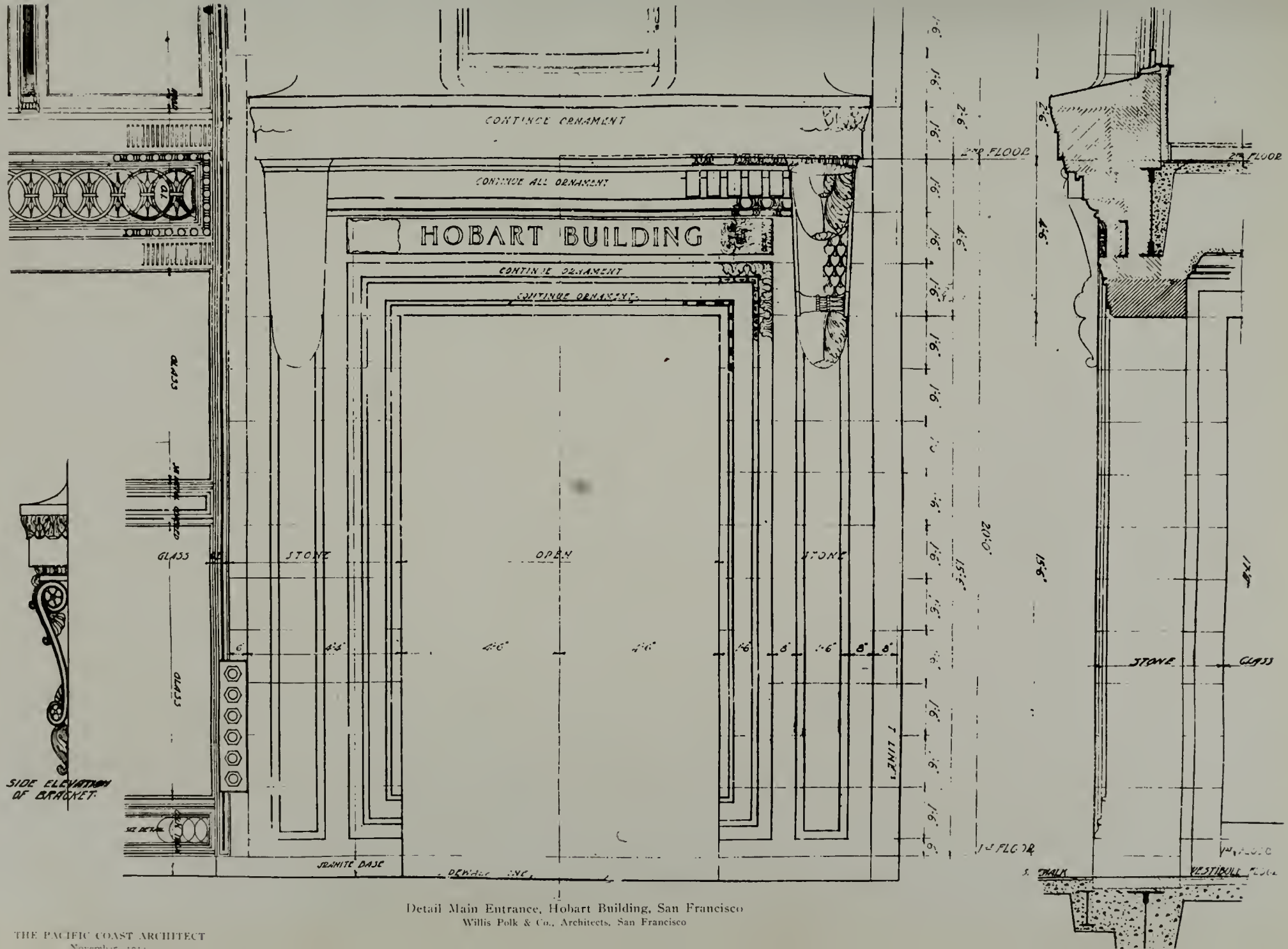


DETAILS OF MAIL CHUTE ON FIRST FLOOR HOBART BUILDING

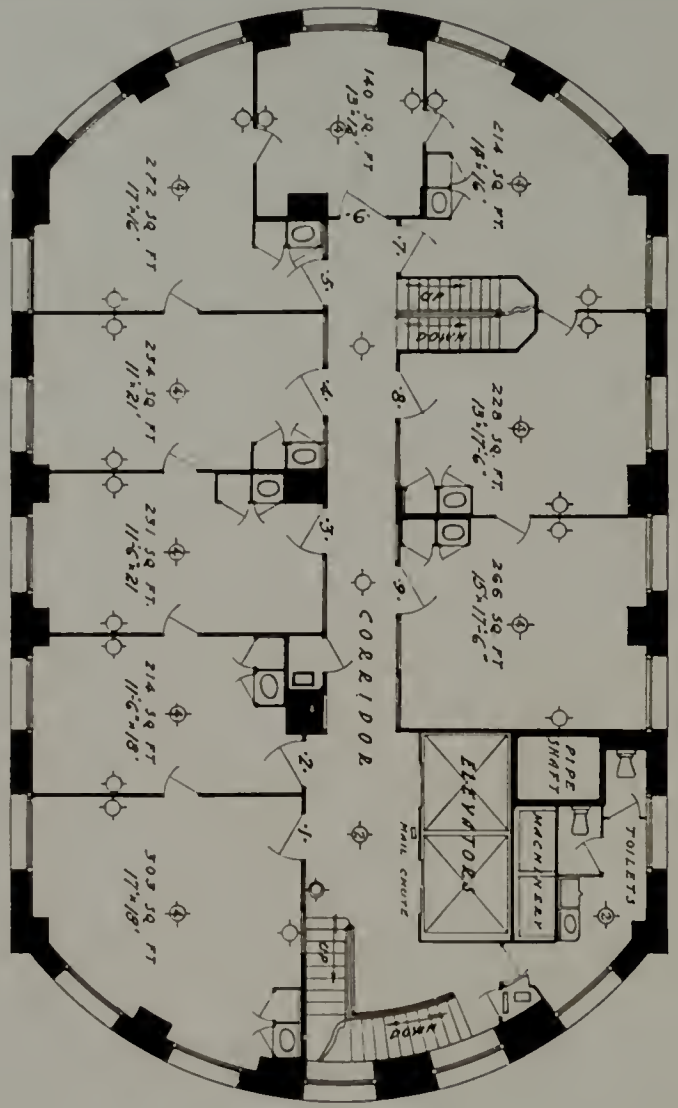
The regulations of the Postoffice Department often prove, on account of their inflexibility, an obstacle to the artistic installation of mail chutes. In the Hobart Building this was especially the case. Structural steel beams interfered with the location of the mail chute on an artistic axis in the vestibule. The problem was finally solved in the manner illustrated in the above diagrams.



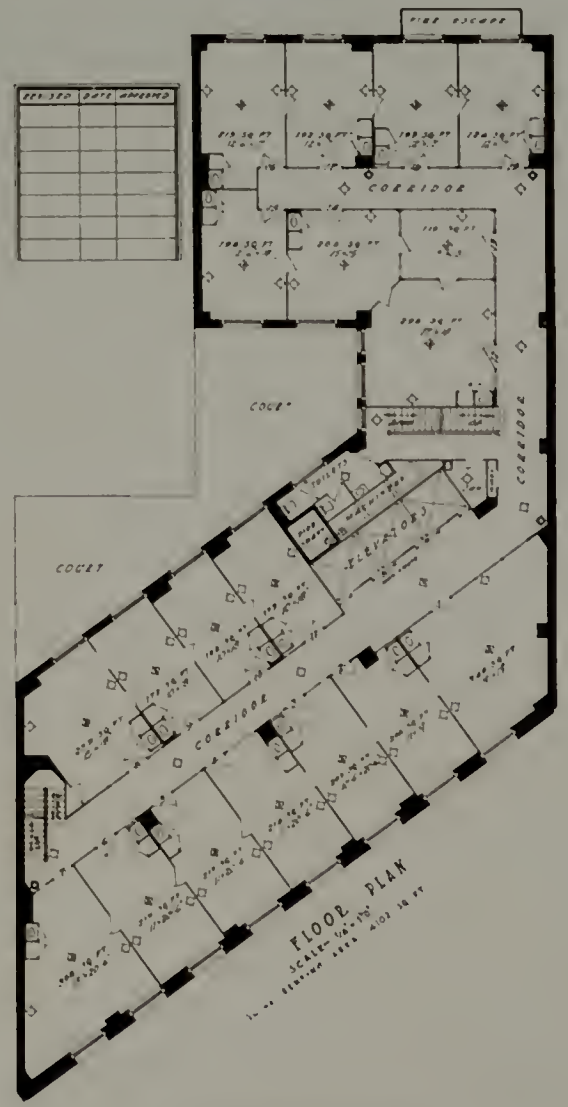
The problem of overcoming the unsightly smoke stack and steam exhaust pipes, which ordinarily disfigure the roofs of our tall buildings, was solved, as above illustrated, by the installation of an ornamental terra cotta finial at the center point of the roof just below and supporting the flagpole. Through the center of this the smoke stack and steam exhaust and ventilation from boiler room is discharged.



Detail Main Entrance, Hobart Building, San Francisco
Willis Polk & Co., Architects, San Francisco

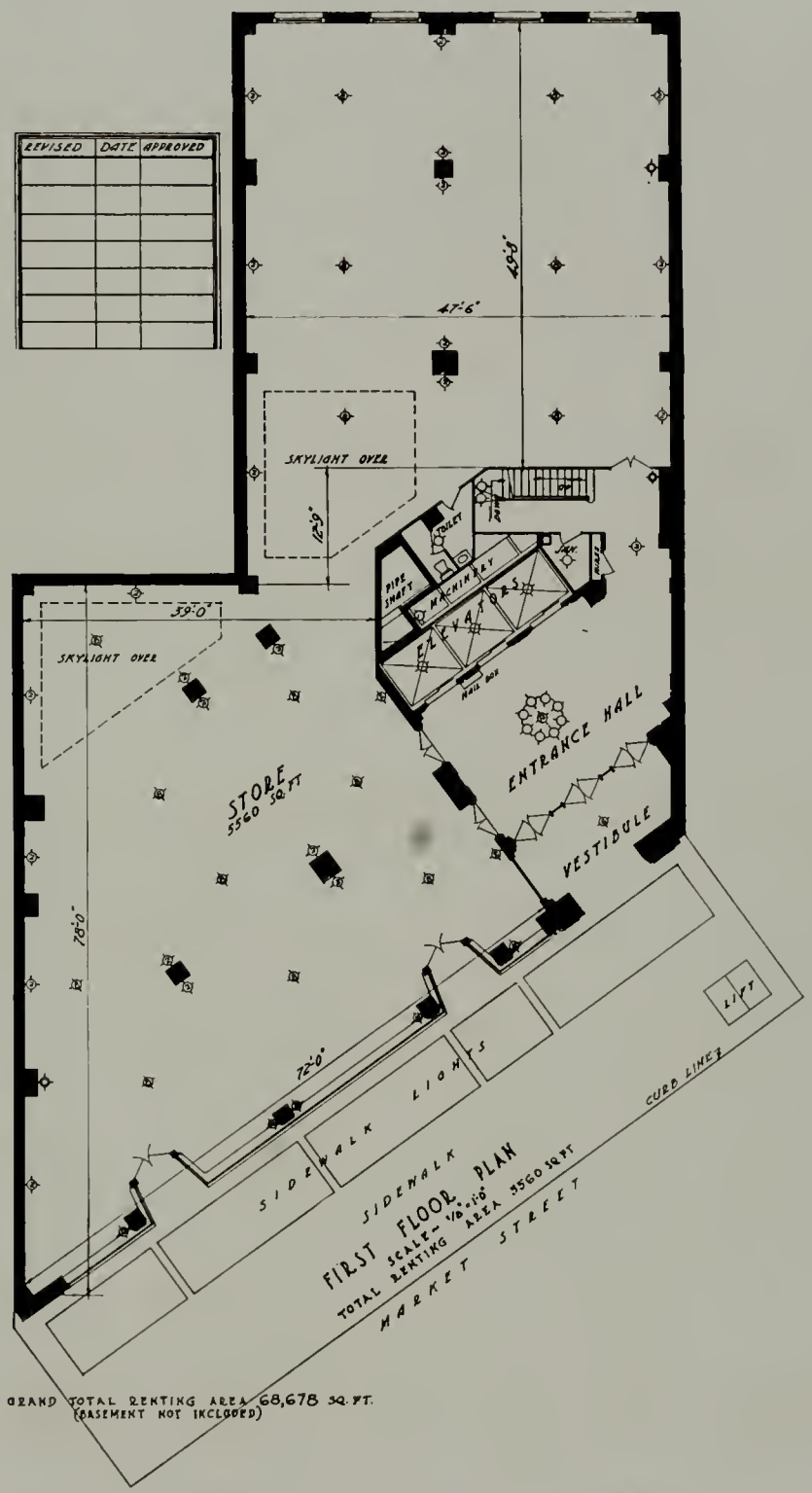


Typical Tower Floor Plan



Typical Floor Plan—Second to Twelfth Floors

Hobart Building, San Francisco
Willis Polk & Co., Architects, San Francisco



First Floor Plan, Hobart Building, San Francisco
Willis Polk & Co., Architects, San Francisco

Screen in San Francisco Agencies Department

Electric Clock, Sansome Street Vestibule

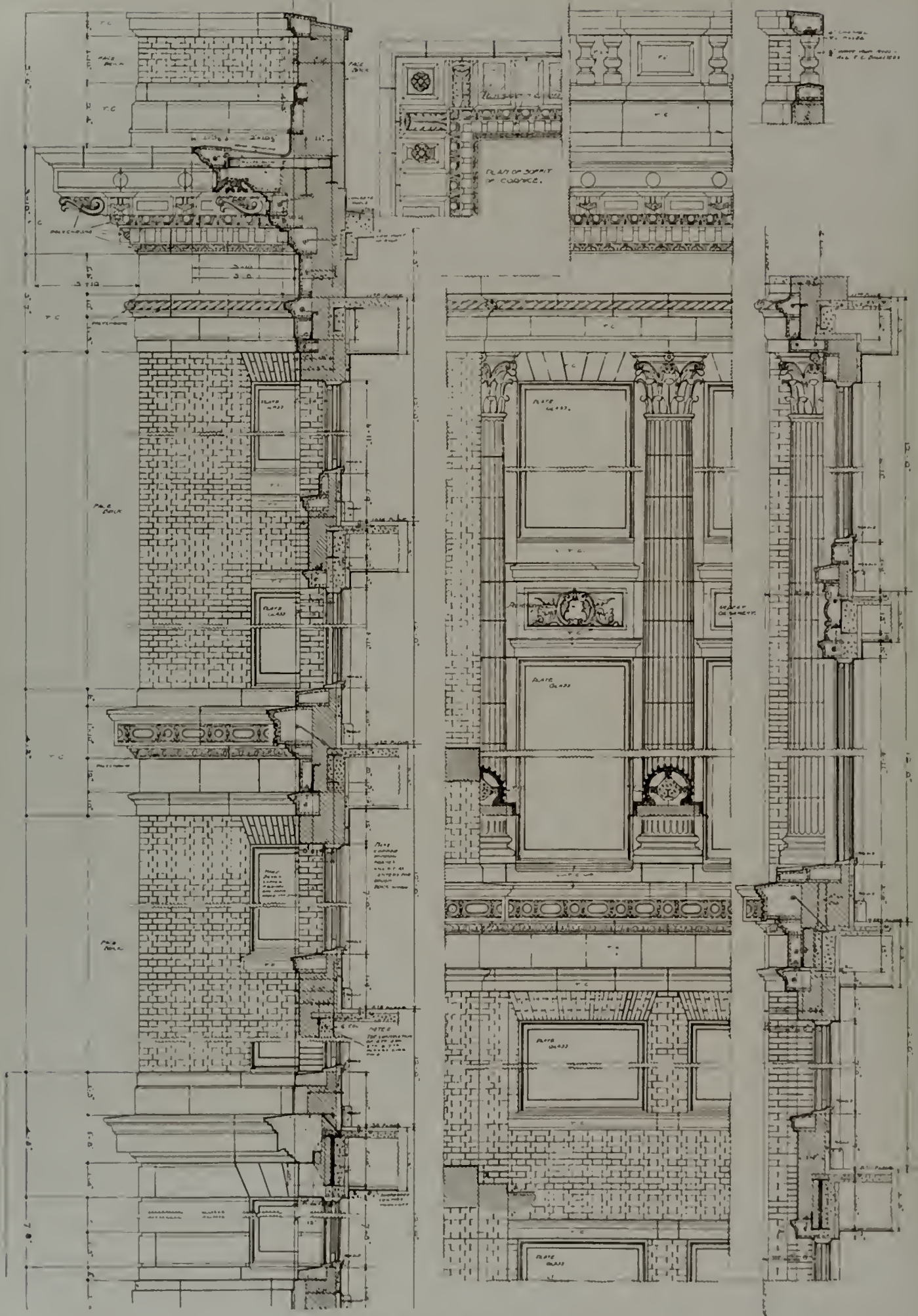
Photo, Gabriel Moulin

Standard Oil Building, San Francisco

Benjamin Geer McDougall, Architect, San Francisco

Standard Oil Building, San Francisco
Benjamin Geer McDougall, Architect, San Francisco

Photo, Gabriel Moulin

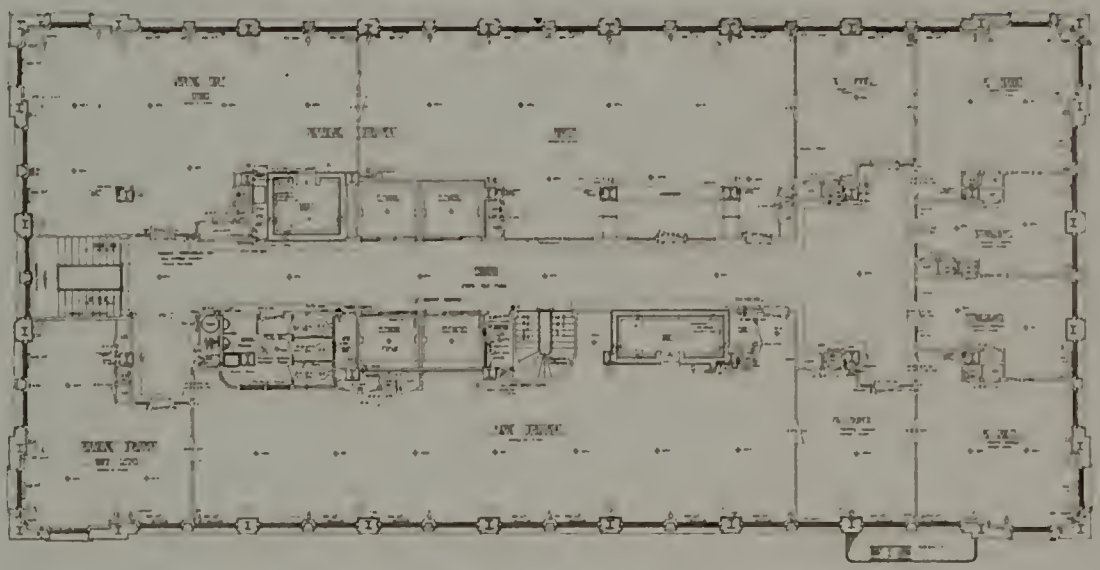


Detail of Exterior, Standard Oil Building
Benjamin Geer McDougall, Architect, San Francisco

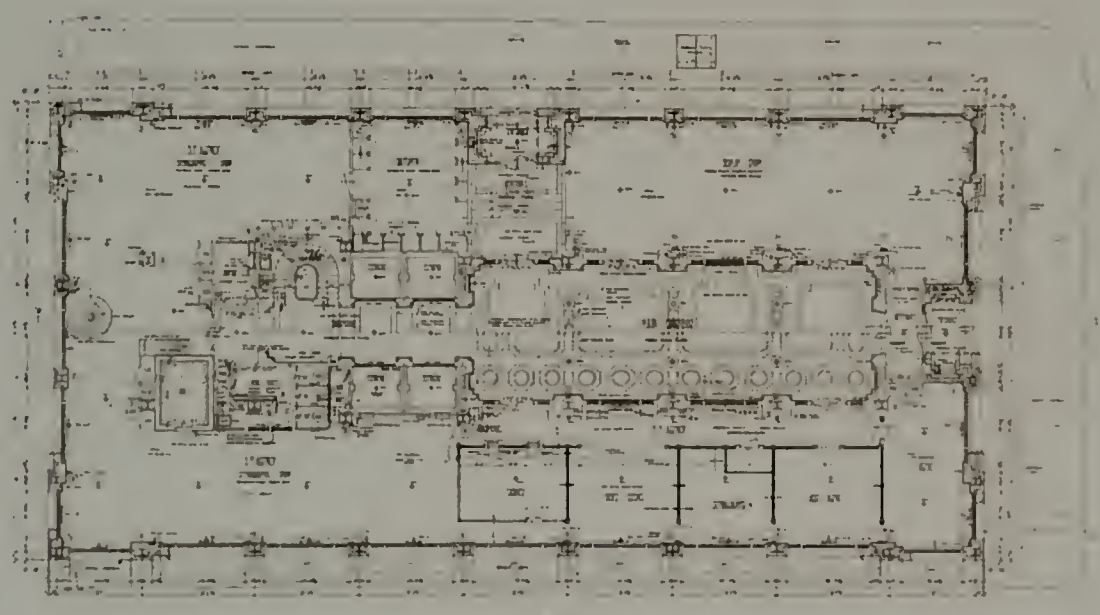
Detail of Upper Stories, Standard Oil Building

Main Lobby, Standard Oil Building
Benjamin Geer McDougall, Architect, San Francisco

Photo, Gabriel Moulin



Fifth Floor Plan, Standard Oil Building



First Floor Plan, Standard Oil Building
Benjamin Geer McDougall, Architect, San Francisco

The Development of Vertical Transportation

By R. J. HUNTINGTON*

The general public little realizes the immense amount of study that has been given to the problem of vertical transportation. When we consider the enormous number of people that are daily carried on passenger elevators in our large cities, and the very few fatal accidents that occur in connection therewith, the fact is forced upon us that the modern passenger elevator is by considerable the safest passenger conveyance in use today. This condition has been brought about by the most careful, painstaking experiment and study on the part of those elevator manufacturers who realize the responsibility involved in the manufacture and installation of this form of passenger carrier. The sky lines of our large cities indicate the evolution of the passenger elevator as nothing else does. It is needless to state that this development could never have been attained were it not for the perfection reached in the art of vertical transportation.

A few years ago the hydraulic elevator was the type most commonly in use in office buildings, and about twenty stories was the limit in height at this period. Three principal forms of hydraulic elevators were developed—i. e., the horizontal cylinder type, vertical cylinder type, and direct lift plunger type. The direct lift plunger elevator, one of the earliest hydraulic types, was brought into general prominence in this country by its introduction to the public through a well-known technical school in New England, and gained considerable popularity for a few years. While for comparatively low rises and moderate speeds it has given satisfaction, and was a form of construction that for a time appealed to many, it has now lost its popularity except for short rise, low speed work, and principally for freight service. The geared types of horizontal or vertical cylinder are still looked upon with favor by many engineers for buildings of moderate height and sufficient size to warrant the installation of a high pressure steam power plant.

In the early nineties, when electricity as a source of power began to come into general use, and a demand for electrically operated elevators had been created, the engineers and inventors with the leading manufacturers turned their attention to this new field. Success met their efforts, and during the next several years a rapidly increasing proportion of the elevators made were of the electric type. The early electric passenger elevators were all of the worm gear drum type. This type with different controls has been the standard electric elevator for several years. The controls commonly used are three, i. e., hand rope, car switch and push button. The hand rope is the simplest form of control, consisting of a flexible iron cable running through the car, connection being made to the elevator engine by the rope attached to the sheave on the machine. This sheave when turned by pulling on the hand rope in the car forms contact in the operating switches, starting the motor and causing the car to travel, the direction depending on which way the hand rope in the car has been moved. This type of elevator is used only for slow speeds, and almost entirely for freight elevators.

The car switch control is the standard form for electric passenger elevators, as it includes safety features not possible to obtain with the hand rope control, and is much easier to operate. The small lever switch in the car is connected to the controlling apparatus of the elevator engine by means of a flexible electric cable suspended from the bottom of the car, the other end of this cable being joined in the junction box at the center of the hoistway with the wiring from the controller. The car is started by the operator moving the handle of this lever switch either to the right or the left. This operating switch is so arranged that if the operator releases the handle while the car is moving, the switch lever will automatically return to the center, stopping the car. This is a safety feature of much importance. This car switch control worm gear drum type electric elevator is the one that has been commonly used for buildings of moderate height where high speed is not essential.

The push button control, commonly termed the automatic elevator, is quite popular on the Pacific Coast for use in apartment houses, private residences and other buildings where the service is such that the expense of an operator is hardly warranted. The push button control elevator is operated by a series of push buttons located in the car, and a push button side of the door at each landing. Many improvements and safety features have been added to the original push button control elevator, so that today this type of elevator is provided with all possible safeguards against carelessness. The best push button control elevators are so arranged that it is impossible to start the elevator car unless all the doors in the hoistway are tightly closed, and no hoistway door can be opened unless the car is opposite that particular door. The elevator car is also provided with collapsible gate electrically connected with the elevator control, so that this gate on the car must be closed before the car can be started. This is a safety feature of great importance. Another safety device is, that the elevator is so arranged that when the car reaches the landing to which it was sent, the door at that landing must be opened and closed before the car can be called away by pushing any of the buttons. The latest device in the way of a safety feature to be added to the push button control elevator is what is known as the magnet cam device. The door locks on the hoistway doors are released by a cam on the elevator car. The objection to this arrangement has been, however, that this cam on the car struck every lock up and down the hatchway in passing, and made it possible for someone standing in the hallway to open the door from the landing at the instant when the car was passing. This results not only in stopping the car, but in probable damage to the electric contacts by excessive arcing. This trouble is now taken care of by a magnet cam device, so arranged that when the car is sent to a certain floor the cam on the car is magnetically drawn back so that it does not engage any of the door locks until it reaches the floor to which it is sent. From the above it can be seen that about every possible emergency has been provided for in the way of safety devices.

The electric elevators above mentioned, are built for operation on both direct and alternating current circuits.

The drum type electric elevator is being rapidly superseded in public favor by the traction drive, which employs a driving sheave instead of a drum. This avoids fastening the cables to the driving mechanism (see description of gearless traction elevators for method of roping), and makes it possible for the car or counterweight to be forced into the overhead work through failure of the ordinary limit stops. This worm gear traction type is appropriate for passenger elevators of moderate speed and moderate rise, and for service elevators

*Pacific Coast Manager, Otis Elevator Co.

in hotels, department stores, etc., also for high class freight elevators.

The rapid increase in the height of the modern office building has demanded an elevator that has a practically unlimited car travel, and this demand has developed the gearless traction electric elevator. In this type of elevator, the working parts have been reduced to the simplest possible elements. The elevator engine consists of a motor, traction driving sheave and a brake pulley, the latter enclosed with a pair of powerful springs actuated electrically released brake shoes, all compactly grouped and mounted on a heavy iron bed plate. Instead of the high speed motor used with the geared electric elevators, a slow speed shunt wound motor, designed especially for this service, is used. The armature shaft, which is of high tensile steel, of unusually large diameter, is also the driving shaft, and on it are mounted the brake pulley and the traction driving sheave. The introduction of the direct drive, and the consequent doing away of all the intermediate gearing between the motor and the driven member results in a machine of remarkably high efficiency, and the use of the slow speed motor, together with the carefully designed controller, gives starting, accelerating, retarding and stopping features unequaled by any other type of elevator. The driving cables, from one end of which is supported the car, and at the other end the counterweight, pass partially around the traction driving sheave, continuing over or under an idler leading sheave, thence again around the driving sheave, forming a complete loop around these two sheaves, this arrangement resulting in the necessary tractive effort for lifting the car. One of the striking advantages resulting from this arrangement of cables, and the method of driving same, is the decrease in traction which follows the striking on the bottom of the hoistway of either the car or counterweight, and the consequent minimizing of the lifting power of the machine until normal conditions are resumed. Inasmuch as in any properly constructed elevator the parts are so arranged that the member (car or counterweight), which is at the bottom of the hoistway, must strike and come to rest before the other member can possibly come in contact with the overhead work, it will be readily seen that the above mentioned decrease in tractive effort is a very valuable and effective safety feature inherent in this type of elevator.

The controller is so designed in connection with the motor, that the initial retarding of the car in bringing the same to stop is independent of the brake, the latter being requisitioned to bring the car to final and positive stop, and to hold same at the landing. The motor is also so governed electrically as to prevent its attaining any excessive speed with the car on the down motion, no matter what the load in same may be. In designing the controlling equipment, one of the features demanding greatest consideration—in view of the very high speed at which the cars run—was the automatic retarding of their speed and the final stop of same automatically at the upper and lower terminals of travel. This result is very satisfactorily attained with the installation in the elevator hatchway of two groups of switches, located respectively at the top and bottom of the hatchway, each switch in the series being opened one after another as the car passes, each operation resulting in the reduction of speed until the opening of the final switch brings the car to a stop, applying the brake. This operation is entirely independent of the operator in the car, and is effective even though the car operating device be left in the full speed position. Failure of any one of these switches merely results in the stopping of the car, which cannot be run until the switch is put in commission again.

Another feature of security of the greatest interest and importance is provided in the oil cushion buffers. These are placed in the hoistway, one under the car and one under the counterweight, and are arranged to bring either the car or the counterweight to a positive stop through the telescoping of the buffer—this telescoping occurring at a carefully calculated rate of speed which is regulated by the escape of oil from one chamber of the buffer to another. The buffers have been proven capable by test of bringing a loaded car safely to rest from full speed, and in this respect are unique among elevator safety features of comparatively low cost.

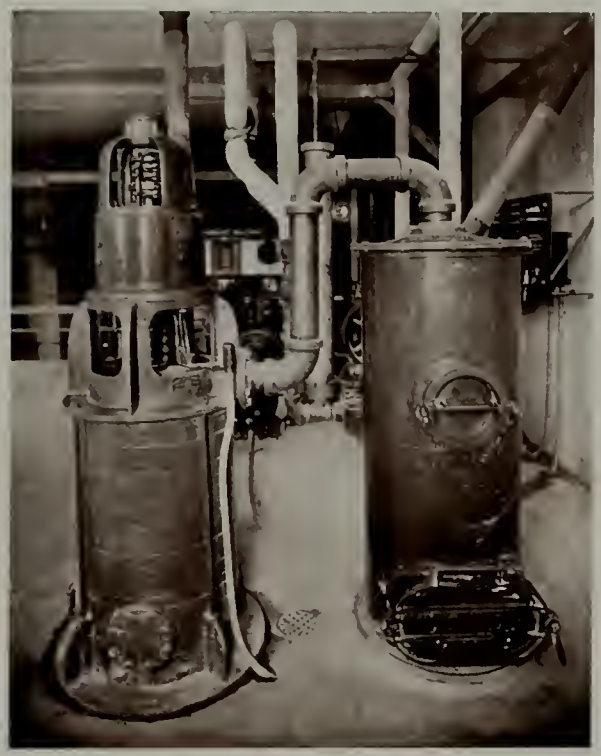
The usual safety devices installed in connection with the modern high grade apparatus are used with this type of elevator, including speed governors, wedge clamp safety devices for gripping the rails in case of the car attaining excessive speed, and potential switches. To the advantageous features already enumerated should be added the simplicity of installation and economy of space, resulting from the use of this machine, especially if the machine itself be located over the hoistway, and the refinements which have been worked out have resulted in an apparatus which in the existing installations has given immediate demonstration of its economy.

We have given a more detailed description of the gearless traction electric type, due to the fact that it is the most highly perfected elevator apparatus yet made, and forms the elevator equipment of the world's tallest business structures. A modification of this type is seen in the 2:1 roping gearless traction machine designed for car speeds up to 450 feet per minute, using a smaller, higher speed motor. The roping is arranged with sheaves on car and counterweight, so that these members travel at one-half the speed of the cables themselves. The gearless traction type of elevator for passenger service—either the 1:1 or the 2:1 roping, is unquestionably in a class by itself, and the rapidly increasing number of installations testifies to its extreme popularity among the leading architects, engineers and builders.

The Spencer Turbine Vacuum Cleaning System

The vacuum cleaner system installed in the Hobart Building consists of a turbine air exhauster and auxiliary dirt-receiving tank in the basement and the piping system which runs up through the building to the top. Inlet valves with spring covers, which automatically close when the hose is removed, are assembled in the piping system at each floor, so that the light and flexible vacuum cleaning hose can be quickly and easily attached to these inlet valves for cleaning purposes. The inlet valves are finished to match the hardware throughout the building.

The cleaning tools are constructed of pressed steel and aluminum, combining to the greatest extent lightness and serviceability. The carpet and bare floor renovators are twelve and fifteen inch size, equipped with exceptionally wide cleaning slots, easily handling not only dust but such other litter as is not easily picked up by hand. The wearing surfaces are cheaply and quickly renewable. They are equipped with the Spencer patent controllable swivel, which enables the operator to reach dirt in corners, under furniture, etc. The tool equipment



SPENCER TURBINE CLEANER PLANT INSTALLED IN THE HOBART BUILDING.

includes various types of brushes for use in cleaning walls, furniture, etc.

The heart of the system is the vertical turbine air pump, which is direct driven by an electric motor mounted on top of the turbine. The machine is extremely simple and durable in construction, and the moving element consists of a vertical steel shaft on which is mounted a series of steel impellers or fans, and there is a wide clearness between the moving and stationary elements which come in contact only at the ball bearings. In exhausting the air the end thrust of the moving element of the turbine is upward, and this is almost exactly counterbalanced by the weight, so that in reality there is practically no thrust or strain up, down or sideways, which makes a very simple and efficient arrangement.

The dust and dirt and litter, such as cigar and cigarette stumps, are sucked down through the piping system to the large auxiliary dirt-receiving tank, where this foreign matter is centrifugally separated from the air. The vitiated air is then carried completely out of the building through the smoke-stack, and the cleaning operation conforms to hygienic laws throughout.

Owing to the constant potential given by a turbine type of air exhauster, the vacuum is always maintained practically constant, whether only one or the full number of sweepers is in operation, and the power consumption is in proportion to the work being done. The advantage of this constant potential feature of the air turbine is that after designing and building a machine to give the proper vacuum so that the suction is strong enough to do thorough and rapid cleaning and not strong enough to injure carpets or rugs, this suction does not vary at the cleaning tool, whether one or more sweepers are in use.

Among the advantages of the Spencer machine are that it requires no wet separating tanks, no sewer connections and, being direct driven, it requires no belts, gears, or chains with their resultant noise and trouble. Neither does it require any mufflers, sight-feed oil cups, valves or valve seats.

The vacuum cleaning system in the Hobart Building was installed by Hughson & Merton, Inc., 530 Golden Gate Avenue, San Francisco, Pacific Coast Representatives for the Spencer Turbine Cleaner Company, of Hartford, Connecticut.

Semi-Indirect Lighting

By CHARLES T. PHILLIPS, C.E.*

While the title "Semi-Indirect Lighting" may not fit the system of lighting which will be described, it has been accepted as standard. The term "direct-indirect" is urged by many to be a more appropriate description, but while it may be correct it is not universally used.

This system of lighting usually consists of a lighting fixture where a portion of the light rays are directed on the plane to be illuminated, while the balance are directed against the ceiling for redirecting to the same plane.

The advantages of this system are that the efficiency is increased in some instances over the straight system of indirect lighting and at the same time the glare and sharp shadows of the direct method of lighting are avoided.

The numerous forms of bowls of translucent glass which are used for lighting are a form of semi-indirect lighting, but the efficiency is usually low and for commercial purposes, where economy in correct consumption is an important factor, these bowls have not proven a success.

The fixture shown in this article has been designed to overcome the objections to the plain bowl and consists

*Consulting Engineer, Pacific Building, San Francisco.

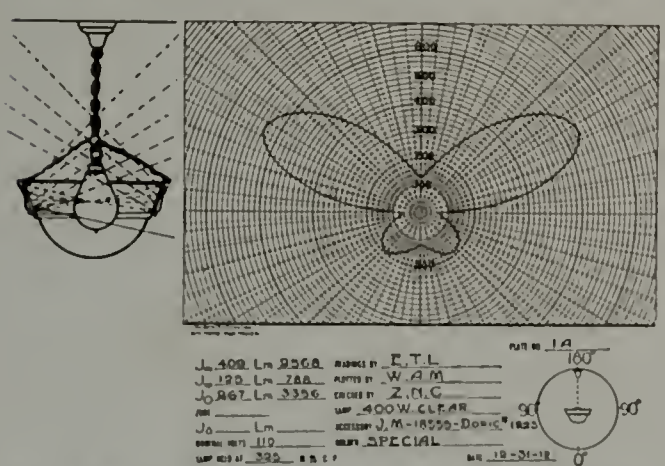
VIEW DOWN THE AISLE IN THE EMPORIUM

NIGHT VIEW INTERIOR OF THE EMPORIUM.

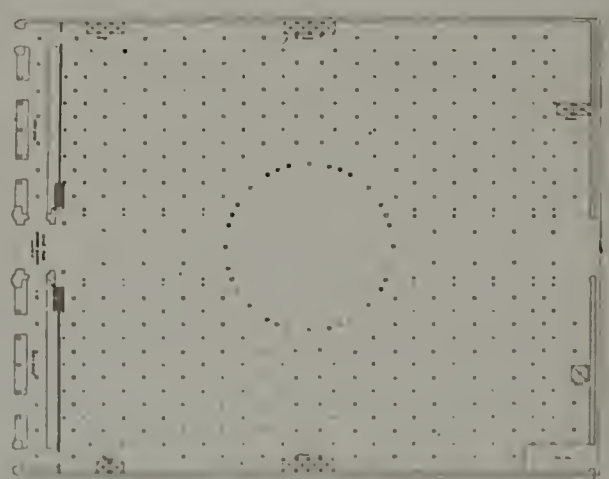
of a spun or cast metal flange containing corrugated mirror reflectors and a translucent bowl. Sufficient light is forced thru the translucent bowl at the bottom to give a soft, evenly diffused light, and by revealing the light source, a cheerful appearance is given without an objectionable glare. Sufficient shadow is obtained to bring out the details of objects in the room without sharp contrast. Eye strain is thus avoided and the resultant illumination is most pleasing.

The accompanying cut is made from a photograph of an installation of this type of lighting in one of the largest department stores on the Pacific Coast. It is perhaps one of the largest single areas of store space in the country and the goods displayed are most diversified in character and display.

This type of lighting, combined with the nitrogen filled incandescent tungsten lamp, gives perhaps the nearest approach to daylight of any commercial system of light-



Flux polar diagram showing distribution of light above Frink direct-indirect reflecting electrolier using 400-watt evacuated Mazda lamp, and diagram showing arrangement of mirror reflector in fixture.



Floor plan of The Emporium, showing arrangements of electric outlets. Floor space 330 feet by 275 feet 4 inches. Fixtures spaced 16 inches by 24 inches centers. 400-watt lamps used at each outlet.

ing. This, of course, depends to a great extent upon the color of the ceiling and side walls. For daylight value and high efficiency the side walls and ceiling should be white, as any tints in the reflecting surface will affect the spectrum of the reflected light and thus give an entirely different color value to the objects displayed to that obtained by daylight. In stores where it is necessary to match colors under artificial light, the importance of considering the selection of the lighting unit for this purpose cannot be over-estimated.

Where the ceiling and side walls are tinted in medium or dark tones, the efficiency of this system of lighting falls rapidly and the reflected light partakes of the color of the walls and ceiling.

The accompanying photometric curve of the fixture with a 400-watt Mazda lamp shows the proportion of the light rays directed to the ceiling and those that are forced through the translucent glass bowl and fall directly upon the illuminating plane.

In designing a system of illumination of this type, care should be used in locating the outlets, and the height at which the fixtures are hung should be given careful consideration, otherwise, the best results will not be obtained, and the high efficiency and uniform lighting that is possible will be lost.

INDUSTRIAL INFORMATION

All terra cotta work on the new Hobart Building was manufactured by Gladding, McBean & Co., with offices in the Crocker Building, San Francisco.

The association between Architects W. C. Pennell and John C. Austin, Los Angeles, has been severed. Mr. Austin's address is 1121-1125 Baker-Detwiler Building, Los Angeles.

Frederick H. Eley, architect, Santa Ana, Cal., has become associated with Architect John B. Hawley of that city. They will be known as Eley & Hawley, architects, with offices in the Register Building.

Mangrum & Otter, 561 Mission Street, San Francisco, installed the boilers and generating plant and all heating and ventilating apparatus in the new Hobart Building. The company also received and executed the contract for the installation of tile floors.

The exterior and interior marble in the Hobart Building was installed by Joseph Musto Sons-Keenan Company, importers and dealers in marble. This company operates extensive marble mills in Los Angeles, at 1949 Santa Fe Avenue, and in San Francisco, at 535-565 North Point Street. The marble work in the Hobart Building is one of the finest jobs on the coast.

R. Brandlein & Co., 3155 Eighteenth Street, San Francisco, continues to receive praise for the general excellency of their work in connection with the installation of the seating in the recently completed St. Ignatius Church, San Francisco. This job has been pronounced perfect in every respect by authoritative experts.

R. Brandlein & Co. is one of the foremost firms of its particular kind on the Pacific Coast, having the necessary equipment and every facility for executing promptly and correctly work of any description in the following lines: Residential interiors, special furniture, lobbies and vestibules, church work, mill work, bank equipment, bar fixtures, store fixtures, office fixtures and postoffice equipment.

Joseph Musto Sons-Keenan Company, San Francisco, has secured the contract for the interior marble work in the new San Francisco City Hall, the contract price being $235,000. This is the largest contract for marble work ever let on the Pacific Coast. This company has just completed both the exterior and interior marble for the new Hobart Building, the Oakland City Hall and the St. Ignatius Church, San Francisco. They are also installing the marble in the new Oakland Auditorium and the Citizens Bank Building, Los Angeles.

Foreseeing the increasing popularity of wax as a wood finish, and the consequent demand for an absolutely reliable article, Berry Bros., have placed on the market a floor and interior trim wax which maintains the same high standard that has always been enjoyed with all Berry Bros.' products. Berry Bros.' floor wax is said to be the lightest colored wax on the market. On account of its hard drying qualities, it does not collect dust or dirt, nor does it mar easily. Berry wax takes very little labor to keep the finish up.

The clocks and clock system in the new Hobart Building were installed by the Decker Electrical Construction Company, 111 New Montgomery Street, San Francisco, representatives of the Self Winding Clock Company, New York. A handsome marble dial clock was used in the main entrance. It has bronze Roman numerals. All clocks in the Hobart Building are regulated every hour by the Western Union Telegraph Company's time signal of correction, as furnished every twenty-four hours by the Lick Observatory.

The Decker Electrical Construction Company also installed the clocks and clock system in the Standard Oil Company Building, San Francisco. This system is what is known as the synchronizing clock system, each clock having movements of its own, which are corrected every hour by a master clock in the event of any variation. The clock system in this building has given absolute satisfaction. The variation in time during the past year has been less than six seconds.

The clock in this building is superior to the ordinary jumper system, inasmuch if anything happens on the line to any individual clock, the other clocks of the building are not affected by it. This system is being used by practically all of the big Eastern railroads.

The Decker Electrical Construction Company has also had considerable success with its Universal Minute Interval Program Instrument. This instrument, as its name implies, is universal in the fullest sense of the word's meaning. It can be furnished to fill practically any and all requirements in the way of ringing program bells. A schedule of the most complex combination can be rung with the use of one of these instruments. It is a thoroughly up-to-date mechanism designed to operate with the least possible consumption of power. It is entirely automatic and is not liable to get out of order.

Francis W. Grant, architect, has moved from 332 Globe Block, Seattle, to the Mehlhorn Building.

Architect Ira A. Worsfold has moved from Corvallis, Ore., and is now located at Palms, Cal.

Rudgear-Merle Company, Bay and Stockton Streets, San Francisco, installed all ornamental iron work in the new Hobart Building.

Goichi Takeda, Japanese architect, has arrived in San Francisco to complete arrangements for the arrival of materials for the construction of the Japanese pavilion at the Panama-Pacific International Exposition.

Architect I. E. Frary, formerly of Los Angeles, has opened offices in Calexico. Frary has submitted a new building ordinance to the local officials, which it is expected will be put into operation in that community.

The Forderer Cornice Works installed the roofing and metal windows for the Hobart Building. The metal windows were manufactured at the San Francisco plant of the company.

The Clinton Fireproofing Company, Mutual Savings Bank Building, San Francisco, executed the contract for concrete fireproofing for the Hobart Building. This concern worked in perfect accord with the architect, who has given it considerable praise for the general excellency of the fireproofing work.

The Otis Elevator Company installed three Otis ball bearing electric 1-1 traction passenger elevators and one hydraulic plunger sidewalk lift, in the Hobart Building, San Francisco. The ball bearing 1-1 elevator is the latest type of elevator equipment known to the manufacturers of elevators.

Architect Thomas F. Imbs of the architectural firm of Comes & Imbs, St. Louis and Pittsburgh, architects for the new church edifice to be erected for St. Vincent's Parish, corner Adams and Figueroa Streets, Los Angeles, has arrived in that city to consult with the owners concerning the new building. Imbs plans to establish a branch office of his firm in Los Angeles.

Farrell & Reed, contractors, Third and Mission Streets, San Francisco, laid the brick for the Hobart Building, and this firm has since been given credit for doing a very excellent piece of work in this connection. It might not be amiss to mention here that the firm of Farrell & Reed has been doing business in San Francisco for the past twenty-seven years, during which time their contracts have included a large number of the biggest structures in San Francisco and vicinity.

Word still drifts into this office of the most enjoyable time participated in by Southern California architects, who last month were the guests of Architect Octavius Morgan of Los Angeles, at his beautiful country estate, "Valla Vista," near Glendora. The occasion commemorated the twentieth anniversary of the Engineers' and Architects' Association of Southern California.

The fourth annual convention of the Architectural League of the Pacific Coast was held in Seattle on October 15th, 16th and 17th. The gathering was opened with addresses by Mr. Ellis E. Lawrence, former president, and Mr. Oliver LaFarge.

Interesting papers were presented by Mr. Folger Johnston on "Relation of Style to Architecture," and by Mr. Hault Horton on "Tendencies in English Architectural Design of Today." These were followed by discussions by Professor Perry, Mr. John Bakewell, Jr., and Mr. W. B. Faville.

During the time of convention the members were entertained quite extensively by Seattle architects. This feature of the gathering was in charge of C. H. Bebb.

The Pacific Manufacturing Company, 177 Stevenson Street, San Francisco, installed all wood finish on the Hobart Building. Siberian oak was used throughout the building with the exception of a special apartment on the seventeenth floor, which was finished in mahogany, and in rooms on the eighteenth floor, occupied by the Pacific Lumber Company, where redwood was used, this being a product of this concern. Circassian walnut, inlaid with mother of pearl, was used on the elevator cars. The woodwork in this building is truly a beautiful piece of work.

Charles Marshall, traveling representative of the Sandusky Portland Cement Company, Sandusky, Ohio, recently arrived in San Francisco, on a tour of Pacific Coast territory. Before returning East Mr. Marshall will visit the principal towns and cities on the coast in the interest of his company. He advises us of the arrival of a shipment of Medusa White Portland cement, delivered to the Building Material Company, Inc., 583 Monadnock Building, San Francisco. This shipment came through the Panama Canal, it being the first shipment of cement to be so routed.

The S. T. Johnson Company, 1337 Mission Street, San Francisco, recently commenced the installation of a high-pressure boiler equipment and a complete oil-burning equipment for heating the naval hospital at the Mare Island Navy Yard. The equipment includes three seventy-horsepower return tubular boilers set in one battery. The contract was awarded the S. T. Johnson Company because this concern was in a position to make the installation in less time than any competing company, it being the idea of the naval officials to have the work entirely completed before the winter season sets in. The work will be completed on November 7th.

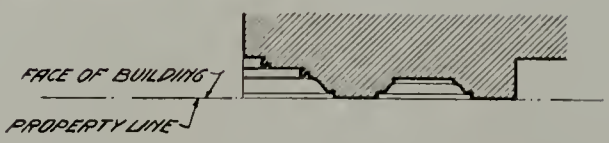
The California Plate and Window Glass Company, 864 Mission Street, San Francisco, installed all plate and window glass in the Hobart Building. This company received the contract on January 26th, of this year, at which time it was advised to be ready to install the glass on the first of July. On that date they were advised by the architect that the sashes were ready for the glass, which in itself is but another indication of the thorough efficiency and perfection of all the plans and arrangements for the building of the big structure, and the company immediately commenced installation. At this writing the job of installing glass is practically complete with the exception of placing the windows in the ground floor stores.

Wittman, Lyman & Co., plumbers, 341-45 Minna Street, installed all plumbing in the Hobart Building, which job was one of the largest plumbing contracts ever let on the Pacific Coast. An amusing spectacle occurred during the installation of the stand pipes, when the fire department officials visited the Hobart job for the purpose of testing the water pressure. Nozzles were attached to the outlets on the roof, which, by the way, are the highest in San Francisco, and the water turned on. About one hundred feet from the building the stream turned into a spray which scattered itself as far as Battery Street and for two blocks down that street. This spray had every appearance and also the effect of a regular rainfall, and hundreds of persons walking on the streets could be seen with their umbrellas up and open to protect them from the water. This water test was satisfactory in every manner.

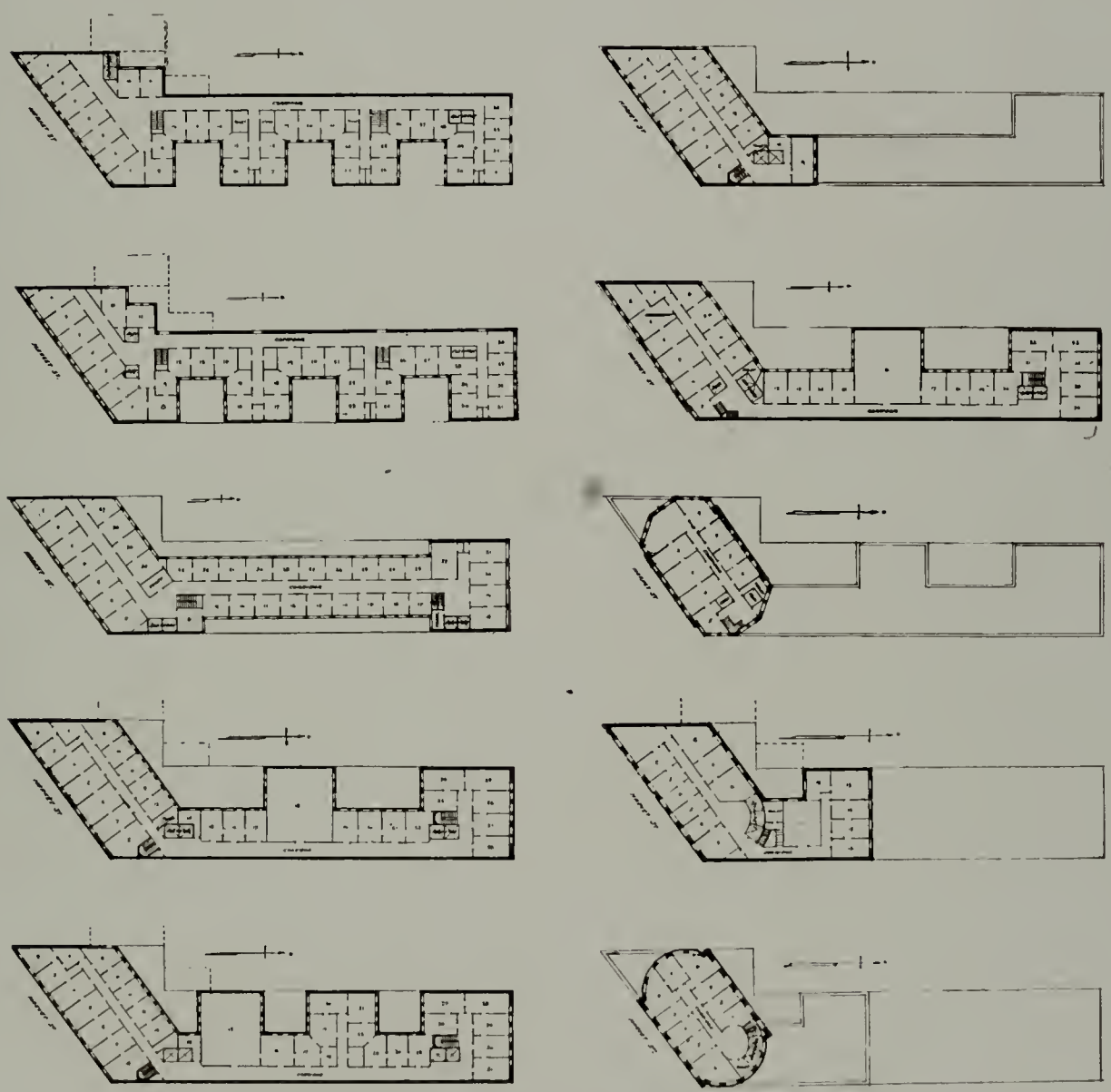
The Wittman, Lyman & Co handled the entire job in the most satisfactory manner without any friction whatever with the architect, and finished the work on time with the building.

The Chronology of an Office Building

Usual method used, to conform to city and county requirements, which do not permit architraves to project beyond property line, which method necessitates placing face of building back from property line.



Unique method resorted to in Hobart Building, which secures successful architectural treatment without placing face of building back from property line with consequent loss of rentable area.



The above are typical examples of many studies of the general plan. It will be noticed that the entrance and elevators, the controlling elements, were placed at many points, and that these studies finally led to locating them at the easterly line of the lot. In this connection, it is interesting to note that the exact location of the elevators was only determined upon after it was decided that a tower plan of 21 stories on the Market Street end of the lot would prove superior, from an investment point of view, to a 12-story building covering the entire lot, which extends through to Sutter Street. Also it was seen that an entrance at the easterly lot line would permit of a corridor extending through to Sutter Street, should it be decided to improve the Sutter Street end of the property. Elasticity in plan was also sought, that is, the entrance and elevators were located so that at any future time, the building could be extended to the east of the present property, or an entrance from Montgomery Street could be introduced.

THE PACIFIC COAST ARCHITECT is the official organ of the San Francisco Chapter of the American Institute of Architects.

San Francisco, Chapter, 1881—President, William B Faville, Balboa Building, San Francisco, Cal. Secretary, Sylvain Schnaittacher, First National Bank Building, San Francisco, Cal.
Chairman of Committee on Public Information, William Mooser, Nevada Bank Building
Chairman of Committee on Competition, Geo. B. McDougall, 235 Montgomery St.
Date of Meetings, third Thursday of every month; annual, October.

OTHER PACIFIC COAST CHAPTERS OF THE AMERICAN INSTITUTE OF ARCHITECTS.

Southern California Chapter, 1894—President, A. C. Martin, 430 Higgins Bldg., Los Angeles, Cal. Secretary, Fernand Parmentier, Byrne Building, Los Angeles, Cal.
Chairman of Committee on Information, W. C. Pennell, Wright & Callender Bldg., Los Angeles.
Date of meetings, second Tuesday (except July and August), (Los Angeles).

Oregon Chapter, 1911—President, Morris H. Whitehouse, Wilcox Building, Portland, Ore.
Secretary, Ellis F. Lawrence, Chamber of Commerce Building, Portland, Ore.
Chairman of Committee on Public Information, Ellis F. Lawrence.
Date of Meetings, third Thursday of every month, (Portland); annual, October.

Washington State Chapter, 1894—President, James Stephen, 720 New York Block, Seattle, Wash. Secretary, Arthur L. Loveless, 513 Colman Building, Seattle.
Chairman of Committee on Public Information, Chas. H. Alden, 513 Colman Bldg., Seattle (till further notice send all communications to Arthur L. Loveless, 513 Colman Building, Seattle).
Date of Meetings, first Wednesday (except July, August and September), (at Seattle except one in spring at Tacoma); annual, November.

Colorado Chapter, 1892—President, George H. Williamson, 528 Majestic Bldg., Denver, Colo. Secretary, Arthur A. Fisher, 459 Railway Exchange Building, Denver, Colo.
Chairman of Committee on Public Information, Arthur A. Fisher, 459 Railway Exchange Bldg., Denver, Colo.
Date of Meetings, first Monday of every month (Denver, Colo.); annual, September.

SAN FRANCISCO CHAPTER, A. I. A.

The Annual Meeting of the San Francisco Chapter of the American Institute of Architects was held at the Tait-Zinkand Cafe on Wednesday evening, October 21, 1914.

After dinner the meeting was called to order by the President, Mr. George B. McDougall, at 8:25.

The Minutes of the regular meeting, held September 17, 1914, were read and approved.

STANDING COMMITTEES.

Board of Directors—The Secretary on behalf of the Board of Directors, read and submitted its Annual Report, which was ordered received and placed on file.

Sub-Committee on Competitions—Mr. Mooser, for this Committee, made a verbal report, which was intended to be written and which was ordered received.

Sub-Committee on Public Information—Mr. Mooser, for this Committee, made a verbal report, which was intended to be written, and which was ordered received.

Legislative Committee—Mr. Mathews, for this Committee, made a verbal report, stating that as there had been no meeting of the Legislature during the past year, there was nothing to report. Preparations were being made for the introduction of legislation at the next session of the State Legislature.

Building Laws Committee—A written report was received from this Committee and was read by the Secretary and ordered received and placed on file.

Educational Committee on Practice—A written report was received from this Committee and was read by the Secretary and ordered received and placed on file.

Architectural League and Education—A written report was received from this Committee and was read by the Secretary and ordered received and placed on file.

Quantity Surveying Committee—Mr. Wright, for this Committee, submitted a written report, which was read and ordered received and placed on file.

Committee on Relations with the State Board of Architecture—A written report was read by the Secretary, which was ordered received and placed on file.

SPECIAL COMMITTEES.

Committee to Gather Data Concerning the Matters Contained in Mr Welsh's Report—Mr. Wright, for this Committee, stated that as there had been no meeting of this Committee, there was nothing to report.

REPORT OF OFFICERS.

The Secretary read the annual report of the Board of Directors and the report of the Secretary and Treasurer, both of which were ordered received and placed on file. The President read his annual address, which was ordered received and placed on file.

On motion duly made, seconded and carried, the Officers and Committees were tendered the thanks of the Chapter for their services during the past term, and the Secretary was directed to have the annual reports printed in accordance with the usual custom.

ELECTION OF OFFICERS

The next order of business was the election of officers for the ensuing year.

There being no other nomination, the Secretary was directed to cast a ballot for Mr. William B. Faville for the office of President. Mr. Faville was thereupon declared duly elected President for the ensuing year.

There being no other nomination and Mr. Bakewell having declined to run as Vice-President, there was no action on this office by the Chapter.

There being no other nomination, on motion duly made, seconded and carried, the President cast a ballot for Mr. Sylvain Schnaittacher for Secretary and Treasurer and Mr. Sylvain Schnaittacher was thereupon declared duly elected Secretary and Treasurer for the ensuing year.

Mr. Day having declined, on motion duly made, seconded and carried, the Secretary was directed to cast a ballot for Mr. Henry A. Schulze and Mr. James W. Reid, the only other nominees for Trustees, whereupon Messrs. Schulze and Reid were declared duly elected to serve the Chapter as Trustees during the ensuing year.

After his election, Mr. Faville assumed the Chair and addressed the Chapter.

ELECTION OF DELEGATES.

Mr. Faville, President, and Mr. Schnaittacher, Secretary, being ex-officio delegates to the next Annual A. I. A. Convention, Messrs. Mooser and Schulze were nominated and elected in addition.

Further, on nomination duly made, seconded and carried, the Board of Directors were empowered to select suitable proxies or alternates to fill any or all vacancies.

It was duly moved, seconded and carried that the Chapter pay for the transportation expenses of the delegates to the Convention at Washington.

In the matter of the nomination for Fellowship, Messrs. Faville, Schulze and Mooser were, on motion duly made, seconded and carried, recommended to the Institute for this honor, and the Board of Directors were further directed to select other eligible names to be transmitted to the Institute.

COMMUNICATIONS.

The following communications were received and ordered placed on file:

Communications from Senators George C. Perkins and John D. Works relative to House Bill S6050 in the matter of the building for the Department of Justice at Washington, D. C.; two communications from E. C. Kemper in connection with nomination for Fellowship and one relating to the Lincoln Highway Association; communications from Willis C. Lowe and Leon H. Smith requesting their resignation from the Chapter; from C. H. Whitaker relative to exhibit at the Panama-Pacific Exposition; from Clinton Day regarding his nomination as Trustee; from John Bakewell regarding his nomination to the Vice-Presidency, and from Lloyd Warren, Chairman of the French Artists Relief Committee appealing for subscriptions to said Committee.

MEMBERSHIP

Mr. Leon H. Smith having submitted his resignation to the Chapter owing to his practicing in the East, on motion duly made, seconded and carried, the same was accepted.

Mr. Willis C. Lowe having submitted his resignation, action was postponed for thirty days with the view of having the Secretary communicate with Mr. Lowe to reconsider the matter.

NEW BUSINESS

Mr. C. H. Whitaker, the editor of the *Journal of the American Institute of Architects*, gave an illuminating address on the purpose of the Journal and its relation to the Institute, the public and the architectural profession in general. At the conclusion of Mr. Whitaker's remarks, he was voted the thanks of the Chapter.

The attention of the Chapter was called to the omission of the name of the architect from the monument in Golden Gate Park, known as the "Portals of the Past." On motion duly made, seconded and carried, the matter of calling the attention of the authorities to this omission was left in the hands of the Board of Directors.

In the matter of the Institute reorganization, the delegates to the convention were instructed that it was the sense of this Chapter that it favored the reorganization plan relating to the Chapters proposed by the Institute; also an enlarged Judiciary Committee by the addition of sub-committees.

In the matter of the Competition Code, the delegates were instructed to bring to the attention of the Institute the omission of proper mention of open competition and also the omission of the matter relating to the professional adviser contained in the previous code.

ADJOURNMENT.

There being no further business before the Chapter, the meeting adjourned at eleven o'clock.

Subject to approval. SYLVAIN SCHNAITTACHER, Secretary.

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SOUTHERN CALIFORNIA, A. I. A.

MINUTES OF THE 75TH MEETING OF MEMBERS. REGULAR EIGHTH ANNUAL MEETING.

The eighth annual meeting of the Southern California Chapter of the American Institute of Architects was held at the Hollenbeck Cafe, Los Angeles, California, on Tuesday, October 13, 1914.

The meeting was called to order at 8:15 p. m. by Vice-President A. C. Martin.

The following members were present:

1. D. C. Allison
2. J. E. Allison
3. John C. Austin
4. J. J. Backus
5. A. B. Benton
6. J. J. Blick
7. Theo. A. Eisen
8. P. A. Eisen
9. H. W. Glidden
10. Elmer Grey
11. J. C. Hillman
12. F. D. Hudson
13. J. W. Krause
14. John P. Krempel
15. A. C. Martin
16. H. H. Martin
17. S. B. Marston
18. Octavius Morgan
19. S. T. Norton
20. T. F. Power
21. A. F. Rosenheim
22. F. L. Stiff
23. J. T. Vawter
24. A. R. Walker
25. H. F. Withey
26. F. R. Schaefer

As guests of the Chapter were present: W. E. Prine, of the Southwest Contractor and John Bowler of the Builder and Contractor.

The minutes of the seventy-fourth meeting of members were read and adopted.

Vice-President A. C. Martin presented the annual address, followed by the annual report of the Secretary.

Upon motion duly seconded and carried, a vote of thanks was tendered by the Chapter to the acting Secretary.

The President's address and the various reports were ordered to be spread upon the minutes of the meeting.

From Fernand Parmentier to Octavius Morgan stating his intention of remaining in Europe during the conflict. This communication was ordered spread on the minutes.

Communications were next read from Carl F. Gould, President, and Myron Hunt, Vice-President, of the Architectural League of the Pacific Coast, inviting representatives to the next Convention of the League. The reply as written on September 25th by A. C. Martin, the acting President, was endorsed.

From Theodore Hardee, inviting exhibits at the Panama-Pacific International Exposition. A resolution was adopted that this Chapter should not take part in an exhibition, for reasons set forth in a resolution adopted by the Board of Trustees of the Institute.

From the San Francisco Chapter, A. I. A., calling attention to the above mentioned resolution of the Board of Trustees. It was ordered that this communication should be answered with a statement of the Chapter's position.

From Edgerton Swarthout, Chairman of the Committee on Government Architecture of the American Institute of Architects, calling the attention of the local Chapter to Legislation about to be passed covering the architectural work for the building of the Department of Justice. The Secretary was instructed to communicate with Senator John D. Works, and Representatives from the Southern Districts of the State in the interests of the architectural profession in this matter of legislation.

From the Illinois Chapter of American Institute of Architects, requesting the endorsement of the candidacy of Mr. Elmer C. Jensen for Fellowship. While this communication was received too late for local Institute members to appear on the Nominating Petition the Chapter nevertheless ordered that a communication be sent to the Illinois Chapter expressing unanimous approval and wishing success in Mr. Jensen's ultimate election.

Communications were next read from A. C. Kemper, acting Executive Secretary of the American Institute of Architects calling the attention of the Chapter to certain items of business requiring immediate attention. First, the election of delegates and alternates to the Convention, which meets in Washington on December 2nd, 3rd and 4th; and second, the submitting of the Chapter's report to the Secretary of the Institute, to be prepared conjointly by the President and Secretary of the Chapter.

A communication was read from M. L. Schmidt, Manager of the Metropolitan Exhibit, suggesting the holding of a reception for members of the Institute and their clients at a date to be determined upon, in the exhibition rooms. After general discussion it was resolved that in place of such a form of endorsement by the architects as outlined, that the Institute should accord Miss Schmidt their co-operation in the form of a communication which could be used by her in furthering her work. It was further ordered that this communication should be written by Mr. Elmer Grey.

Nomination and election of officers was next in order.

Frank L. Stiff, seconded by John P. Krempel, placed in nomination the name of Mr. A. C. Martin for President. On motion made, seconded and duly carried, the nominations were closed and the Secretary instructed to cast the ballot. The Secretary announced the ballot for Mr. A. C. Martin as President, who was thereupon proclaimed by the Chair unanimously elected for the ensuing year.

For Vice-President, Mr. John C. Austin, seconded by J. E. Allison, placed in nomination the name of Mr. S. Tilden Norton. Mr. Frank Hudson, seconded by John P. Krempel, placed in nomination Mr. J. J. Blick. Upon motion of Mr. Backus, duly seconded and carried, nominations were declared closed. Vote was ordered to proceed by ballot, the Chairman appointing the following tellers: W. J. Krause, and J. J. Backus, who distributed blank ballot slips among the members. Ballots returned tallied as follows.

S. Tilden Norton, 17.

J. J. Blick, 8.

A total of twenty-five ballots were cast. It was moved by J. J. Blick that Mr. Norton's election be made unanimous, whereupon the Chair declared Mr. S. Tilden Norton unanimously elected as Vice-President of the Chapter for the ensuing year.

For Secretary, it was moved by A. R. Walker, seconded by A. F. Rosenheim, that Fernand Parmentier be declared elected by acclamation. This motion was unanimously passed and the acting Secretary ordered to cast the ballot, whereupon the Chair declared Fernand Parmentier elected Secretary for the coming year.

Upon suggestion by the President, Mr. A. C. Martin, a motion was duly put, seconded and carried that A. R. Walker be appointed to the office of acting Secretary during the absence of Fernand Parmentier.

The election of Treasurer next being in order, it was moved by Mr. Morgan, duly seconded, that Mr. August Wackerbarth be elected by acclamation to succeed himself for the ensuing year, and the Secretary be instructed to cast the ballot, whereupon the Chair announced Mr. Wackerbarth elected for the ensuing year.

Nominations were next called for Directorship of the unexpired term of Mr. S. Tilden Norton, who was elected to the Vice-Presidency, and for the three-year term left vacant by Mr. Octavius Morgan. Mr. J. E. Allison and Mr. J. J. Backus were duly nominated and seconded, whereupon nominations were declared closed and vote was ordered to proceed by ballot. The candidate receiving the greater number of votes to receive the three-year term. The tellers distributed blank ballot slips among the members and the ballots returned tallied as follows:

J. E. Allison, 15.

J. J. Backus, 9.

A total of twenty-four ballots were cast; whereupon the Chair declared that J. E. Allison would serve as Director for the three-year term and that J. J. Backus would serve the unexpired term left vacant by the elevation of S. Tilden Norton.

Upon the call of the Chapter members, the newly elected President and Vice-President each in turn addressed the Chapter in brief remarks.

The appointment of Committees was deferred by the President until a later date.

The election of delegates to the Forty-eighth Annual Convention of the Institute to be held in Washington on December 2nd, 3rd and 4th, was next in order. The following were elected by acclamation after having been duly nominated and seconded by members present. For delegates, Octavius Morgan, A. F. Rosenheim, John C. Austin, A. C. Martin, John Parkinson. For alternates, John P. Krempel, Frank D. Hudson, Myron Hunt, Theodore A. Eisen, Elmer Grey.

Upon motion duly made and properly passed, the Secretary was instructed to communicate with the Secretary of the Institute regarding the accrediting of delegates by the acting Secretary in the absence of Fernand Parmentier.

It was moved by Frank D. Hudson, seconded and passed, that the acting Secretary communicate with the Institute authorities recommending the election of Fernand Parmentier, Robert D. Farquhar and John P. Krempel to the Fellowship.

Upon proper motion made, an extension to his leave of absence was granted to Fernand Parmentier, the time to be fixed by the Board of Directors.

Following the above, discussion was entered into, led by Mr. Grey, relative to certain Hollywood competitions; and further discussion by Mr. Krempel relative to the 1915 Convention.

It was reported by Mr J. E. Allison for the Committee on the Law of 1872 that an appeal from the Superior Court's decision covering a case of compulsory competition had been made in an Imperial Valley case, and that the local Committee in order to strengthen this case before the Appellate Court had employed the services of Seward Simons, whose bill for preparing the brief filed was $250.00. Moved by Mr Morgan, seconded by Mr. Rosenheim, the Chapter was authorized to pledge $20.00 as an organization toward this bill, and the balance was to be raised by subscription among the members.

After various other discussions the meeting adjourned at 10:30 p m.

FERNAND PARMENTIER,
Secretary.

By A. R. WALKER,
Acting Secretary.

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OREGON CHAPTER, A. I. A.

Held at the University Club, September 7, 1914.

Meeting called to order by President Whitehouse. Wm. G. Holford appointed Secretary pro tem in the absence of Secretary Lawrence. Those present were Messrs. Schacht, Lazarus, Thompson, Beckwith, Mayer, Fouilihoux, Naramore, Hogue, Hoffman, Doyle, Whitehouse and Holford.

Minutes of the last meeting were accepted as printed.

REPORTS OF COMMITTEES.

Committee on Competitions—Mr. Mayer reported that a letter had been written to the San Francisco Chapter inquiring about Louis Hobart participation in the recent Portland Postoffice Competition, but no answer to date had been received.

Educational Committee—Mr. Holford reported on exhibition at San Francisco, that the following letters have been received from the San Francisco and Washington Chapters in response to an inquiry concerning exhibiting at the Panama-Pacific International Exposition.

July 22, 1914.

Theodore Hardee,
Chief of the Department of Liberal Arts, Panama-Pacific International Exposition,
San Francisco, California.

Dear Sir: I am directed by Mr. Geo. B. McDougall, the President of the San Francisco Chapter, A. I. A., to advise you as to the matters contained in your communication of July 15th.

As you may know, the question of an architectural exhibit was presented to the Chapter about a year ago, and at that time was referred to the Institute at Washington for advice as to the proper course to be pursued. A committee was appointed by the Institute for the purpose of making a report. At the meeting of the Executive Committee of the Institute, held on May 16, 1914, the following resolution was adopted:

"*Resolved*, That in view of the fact that the buildings of the Panama-Pacific International Exposition are in themselves a more definite exhibition of architecture than drawings, and more generally interesting to the public, the Institute does not desire to make an exhibit of drawings, and suggests that the Director be asked to insert a notice to this effect in the catalogue of the Exhibition of Fine Arts."

The San Francisco Architectural Club is planning an exhibition during the Exposition period, and this Chapter does not wish to do anything that might be considered as effecting the Architectural Club Exhibit, and therefore, will not be an applicant for any space as a Chapter.

However, your communication will be read at the August meeting of the Chapter, and should any individual member desire to make an exhibition he will be advised that he can communicate with your department.

Yours very truly,
(Signed) SYLVAIN SCHNAITTACHER,
Secretary.

Mr Wm. G. Holford,
Chairman Educational Committee,
Portland, Oregon.

My Dear Mr Holford: Your letter of the 28th inst at hand. This Chapter has never taken any action in regard to placing an exhibit in the Panama-Pacific International Exposition and the matter has never been brought to the attention of the Chapter.

Can you give me any further information in regard to it, or tell me where I can obtain it?

We do not have any meeting until the 1st of October, and at that time I will bring it to the notice of the Chapter and advise you what action we take in regard to it.

Yours truly,
ARTHUR L. LOVELESS,
Secretary.

Committee on Quantity Survey—Mr. Hogue reported as follows:

REPORT OF THE QUANTITY SURVEY COMMITTEE.

The Committee wishes to record the use of the Quantity Survey by Commissioner Dieck of the Department of Public Works in the estimates for the new city barn, to be built by the city of Portland. This, we understand, makes the fourth use of the Quantity Survey in the United States, it having been used in the following order: 1. San Francisco; 2. Wilmington; 3. Boston; 4. Portland.

The Committee wishes to present for endorsement the enclosed report on standardization of building materials; this Committee have been delegated to represent the Chapter in the joint committee which makes the report.

The report has been endorsed by the other two organizations represented in the joint committee, the Builders' Exchange and the Manufacturers' Association.

CHESTER J. HOGUE,
Chairman.

It was moved, seconded and carried that this report be accepted and the report of joint committee on Standardization as published in the Manufacturers' Journal be endorsed by the Chapter.

Committee on Specifications and Contracts—Reported that their findings had been handed to the Executive Committee and through them forwarded to Mr. Day, Chairman of the Institute Committee.

CORRESPONDENCE.

A letter from Mr. Swartwout, Chairman of Committee on Government Architecture, was read in reference to House Bill H. R. 13,870, in regard to the Department of Justice.

It was moved, seconded and carried that the Secretary be instructed to write the Oregon Senators concerning this bill.

Mr. Beckwith asked that the Chapter appoint a committee to confer with a Committee from the Architectural Club on the future of the Atelier and Club. There being no objection, President Whitehouse appointed Messrs. Doyle, Johnson and himself as the Committee.

According to the Constitution, nominations for officers were called for, the ballots resulting as follows:

Nomination for President—Messrs. Doyle and Whitehouse.
Nomination for Vice-President—Messrs. Johnson and Hogue.
Nomination for Secretary—Messrs. Holford and Lawrence.
Nomination for Treasurer—Messrs. Fouilihoux and Naramore.
Nomination for Trustees—Messrs. Jacobberger, Lawrence, Lazarus and Naramore.

There being no further business the meeting adjourned.

WM. G. HOLFORD,
Secretary Pro Tem.

The regular meeting of the Washington State Chapter of the American Institute of Architects was held at the Arctic Club, on the evening of October 7th, preceded by dinner, fifteen members being present, also Mr. Marshall A. Dean of Ellensburg, Wash.

It was decided to hold an exhibition of the drawings entered in the Elks' Club competition at Tacoma, Wash., in the rooms of the Seattle Fine Arts Society during the coming convention of the A. I. P. C., October 15-16, and the matter was turned over to the Exhibition Committee.

The main part of the discussion related to the plans for the coming convention of the A. I. P. C. and the program for the meetings.

ARTHUR L. LOVELESS,
Secretary.

♠ ♠ ♠

STATEMENT OF THE OWNERSHIP, MANAGEMENT, ETC., of The Pacific Coast Architect, published once a month in San Francisco. This is the sworn statement required by the Act of Congress passed August 24, 1912.

Name of Editor—J. V. Drummond, Business Manager—J. V. Drummond, Publisher—J. V. Drummond, 725 Chronicle Building, San Francisco.

Owners: (If a corporation, give names and addresses of stock holders holding one per cent or more of total amount of stock.) None. (Signed) J. V. DRUMMOND,
Publisher.

Sworn to and subscribed before me this nineteenth day of September, 1914. (Seal) W. W. HEALEY,
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(My commission expires August 28, 1917.)

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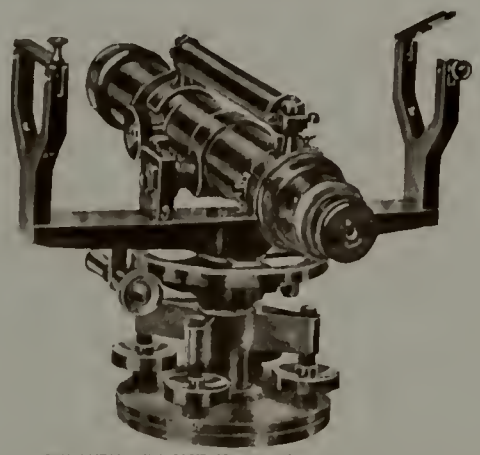

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NUMBER SIX

DECEMBER, 1914

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THE PACIFIC COAST ARCHITECT

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EDITORIAL

Shade Trees for Residential Streets

The value of shade trees on residential streets has been a much mooted question, and it is with interest that we read a recent report of the Massachusetts Forestery Association on this question. Several hundred practical real estate men, when questioned as to the value of shade trees, gave varied answers, the majority of which were to the effect that an increased value of from 10 per cent to 50 per cent resulted, while some went so far as to state that a lot would be worth 100 per cent more if there were full grown shade trees in front of it.

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Oregon Has Architecture Building

Formal opening of the Architecture Building of the Oregon State University was held Thursday evening, November 19th. W. R. B. Willcox, of Willcox & Sayward, Seattle, architects, was the principal speaker before an audience made up of many prominent Oregon architects, university students and the faculty. It was a highly interesting entertainment that marked the occasion. A loan exhibit from the Portland chapter of the American Beaux Arts Society and from the Massachusetts Institute of Technology, together with a collection of Caproni busts proved most entertaining.

The Architecture Building will be used for other work than architecture, notably forms of the fine arts. In architecture twenty-one students are majoring during this first year, and Director Ellis F. Lawrence expects each succeeding class to be of about that number. The building can accommodate seventy students in design and structural architecture. It contains a testing department that is to be equipped with machines for ascertaining the strength of woods, cements and other building material.

Additional courses will be added each semester until by 1916 a full four-year course in architecture will have been established.

The editor of this journal extends his most hearty good wishes for the success of this new department—a success that is sure to prevail under the efficient leadership of the director—Mr. Ellis F. Lawrence.

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Building Operations Show Big Gain

Despite the war and the unusual excitement attendant upon the recent State election, it is very pleasant to note that the building permits in San Francisco, for the month of October, were larger than any corresponding month since 1908, which was one of the boom years following the San Francisco fire.

Permits for this month amount to $2,570,013, and this does not include the contract for the Twin Peaks tunnel, which amounted to over $3,000,000.

Other sections of the country have shown somewhat of a falling off in building activities during October. The splendid record of San Francisco speaks very highly for the fundamentally sound basic conditions prevalent in that locality.

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Los Angeles Wants A. I. A. Convention

Los Angeles architects, through the medium of the Southern California Chapter of the American Institute of Architects, are making earnest endeavors to secure for Los Angeles the 1915 convention of the national body. Special delegates will attend the convention to be held in Washington during the early week in December, at which time they will make formal request to this end.

Should the convention be held in Los Angeles it will mean much to that section, and in fact should benefit the entire State. The convention meets every two years at Washington, and in the intervening years meets in some city designated by the Board of Directors.

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Architect Starts Protest Movement

A movement of protest against the destruction of historical buildings and works of art in the European conflict, has been inaugurated, and has for its sponsor, George F. Hammond of Cleveland, Ohio, one of the oldest and best known architects in this country. Hammond has addressed a letter to the architects of the United States, expressing his views and asking co-operation in the movement. The architects are requested to forward letters of protest which, in turn, will be brought to the attention of foreign officials.

Point Defiance Park

Perhaps no city in our country has a park so unique in situation, so varied in scenery, and rich in beauty and possibilities as Point Defiance Park at Tacoma, Washington. The development of such a park for public use offers great opportunities to the landscape architect and many interesting problems to the architect.

The park occupies the point of land several miles to the northwest of the city surrounded on three sides by the waters of Puget Sound. It comprises about 637 acres, has about 3½ miles of coast line, and has an altitude of more than 300 feet above the tide level. The natural scenery within, and the views from, the park are almost unexcelled. To the northwest is the Olympic Range, with its snow capped peaks; to the southeast Mount Tacoma, the highest peak in the United States, rises far above the buildings of the city, reflecting at times the sunlight from the glacier surfaces.

Within the park are many beautiful scenes; magnificent trees, fine masses of native shrubbery, flowers, and ferns, forming at places an almost impenetrable wilderness.

The park doubtless will always be known principally for this natural beauty, but the extent, and the general

Typical Scene at Point Defiance Park, showing the rugged character and height of the shore sides of the park

A View on the Long Drive Through Point Defiance Park Forest. This spot is about three miles from the park entrance.

arrangement, as well as the demands of a public composed of many minds and inclinations, justify reasonable areas devoted to other attractions.

Previous to 1911 the development had proceeded in a more or less disconnected, haphazard manner, and the result naturally lacked unity and beauty. It was then decided by the directors of the Metropolitan Park District to secure comprehensive plans for the future improvements. Hare & Hare, landscape architects, of Kansas City, Missouri, were chosen to study the problem and prepare plans and reports. Their plans and drawings comprised about fifty sheets, ranging from general plans at a scale of 200 feet to the inch to details at a scale of one-

half inch to the foot, and were accompanied by reports and specifications. This material will be the basis of improvements for years to come.

The proposed arrangement calls for three distinct portions of the park, each with a separate function.

East Front of the New Street-Car Station. Finished in 1914 at a cost of approximately $30,000.

First. The athletic portion separated from the remainder of the park by the car line, and devoted to athletic field, running tracks, field house, outdoor gymnasia, tennis courts, children's playground, and natatorium. The service buildings, stables, greenhouses, etc., will be located beyond this portion in a triangular corner.

Second. The portion, including the main entrance, the buildings and features of the "Zoo" grouped about a central lawn area. This main lawn has a beautiful concave surface and a water-lily pond in the center.

Third. The wildwood or natural portion, comprising about seventy-five per cent of the park. Here the development will be limited to the improvement of some of the existing roads, the addition of other roads, paths through the forests for pedestrians, and the partial clearing of certain areas for picnic grounds. In this natural portion of the park are the giant trees, ranging up to 300 feet in height undergrown with the thickets of native plants.

The beach along the northeasterly side is an important feature, and might be considered a fourth division of the park, furnishing a distinct attraction. Here the greatest crowds gather in summer. The present pavilion and boat house will be replaced in the future by a more permanent structure. From this the proposed concrete promenade will follow the sweeping curve of the back

View from Entrance to Point Defiance Park.

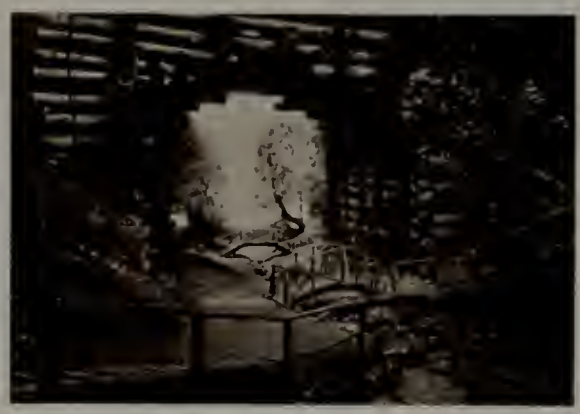
This is a little lily pond in the center of the highly improved portion of Point Defiance Park.

of the beach, at the base of the wooded slope, for a distance of about three-quarters of a mile to the concourse. This concourse will be a paved space or terrace about 400 feet long and fifty feet wide, overlooking the beach, and having piers for the landing of boats. It will be treated formally with trees at regular intervals, and a building at each end, providing shelter, refreshments, and public conveniences. This will be, to a great extent, the gathering place for automobilists, while the pavilion will accommodate more of those coming on the street cars. Space will be provided in the roadways at the concourse for parking more than 100 automobiles.

The buildings in the park will be of the Japanese style of architecture, and the architects should have much interesting study in designing the car stations, shelters, field houses, and animal houses. In making perspective sketches of the proposed development in various places, the landscape architects have been compelled to make general suggestions as to these buildings in order to make the pictures complete.

The plans and specifications for the park provide for fire protection in the woodland by a complete water system with fire hydrants, and a water tank for reserve supply. This tank is to be a part of an outlook tower at the highest point in the park. Electric lighting of the roads, drainage, and the proper policing of the park are other subjects that have received attention in the design.

The principal work done to date toward the realization of these plans has been about the entrance and in the zoological section. Some of the scattering, unrelated buildings, fences, paths, and roads have given way to the new paths and roads on long sweeping curves suited to the natural topography; and the open lawn, unifying the whole scheme. Future buildings erected on the sites provided will tend to emphasize this unity.



The Log Bridge on main forest driveway, a half mile from the car station.

The Architect as a Business Man

BY SYLVAIN SCHNAITTACHER

We assume it in this day, in an article intended for architects, as unnecessary to define the practice of architecture as a profession, as it would be to submit briefs to show that the practice of law is one of the recognized professions.

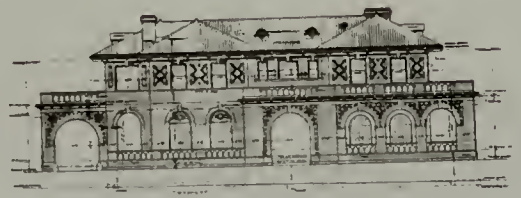
That the architect is a business man, however, is a statement likely to be questioned within and without the profession. That the professional practice of an architect and the conduct of his office embraces many duties which cannot be considered in any other light than strict business transactions, cannot be denied, and it is to a seeming lack of qualification for those transactions, which the writer wishes to discuss.

Professional men, lawyers, doctors, architects, engineers and others, have at many times in the past been called poor business men. "Get-rich-quick" concerns have fattened on the investments of professional men and widows, thereby convincing the public mind that those individuals lacked business acumen, but this is not the phase of business with which we are here concerned unless business success is considered as being measured by material prosperity. A professional man may make poor investments and still display good, sound business sense for the conduct of his practice and the affairs of his clients.

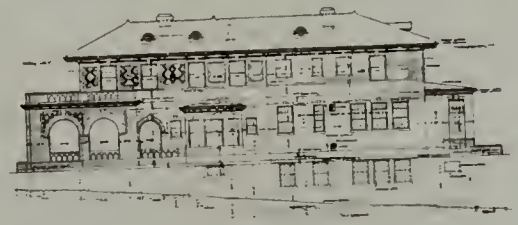
Lawyers find that owing to legislative enactments and the growth of big business, that their practice is confined more and more to the adjudication of purely business problems rather than appearance in court, and that without a wide and thorough commercial education, a lawyer of to-day cannot hope to achieve any great degree of success. Those of us who have had occasion to consult the physician with a successful practice, note that from the time of entering the door of the reception room until leaving the consultation room, providing one is fortunate enough to escape the operating room, every move and statement is registered on cards indexed and filed, for our physical, social and financial history. This all may be professional, but it must be admitted that it has a tinge of business element about it.

The physician and the lawyer have been educated up to the necessity of meeting business conditions with businesslike methods. Good business methods come from scientific training and study of efficiency, and are therefore not to be despised as undeserving of serious consideration in professional training and education. Even the old-style contractor with his hat for his office and a greasy time-book for his records, has been supplanted by the young college-bred engineer with his scientific-looking cost sheets and estimates.

(Continued on Page 241)



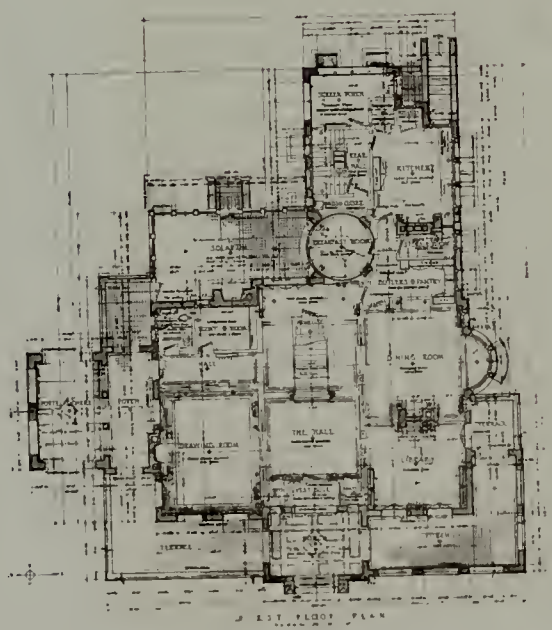
J. C. Rives Resjdence, Los Angeles
A. F. Rosenheim, Architect, Los Angeles



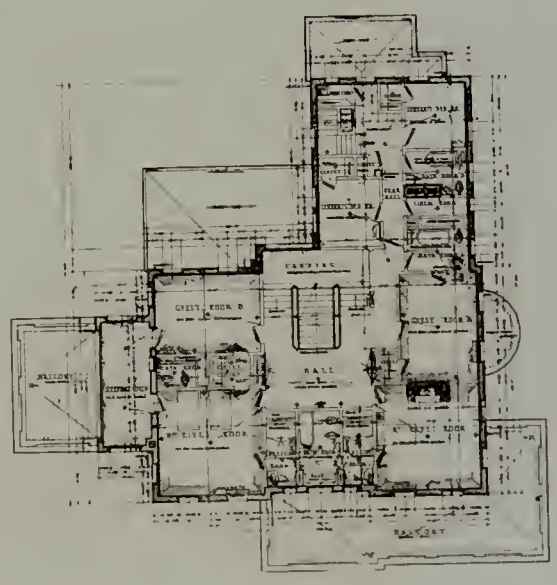
The Hall

Solarium from Breakfast Room
J. C. Rives Residence, Los Angeles
A. F. Rosenheim, Architect, Los Angeles

Looking North toward Entrance



First Floor Plan



Second Floor Plan

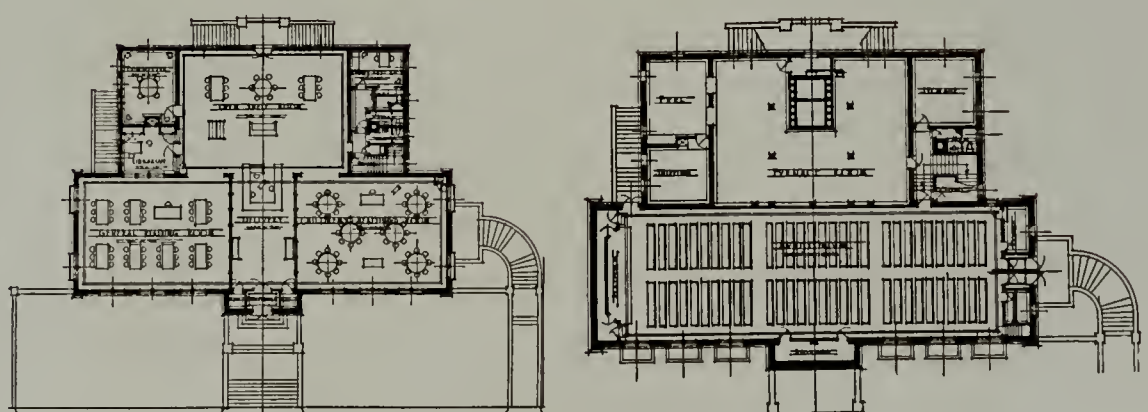
J. C. Rives Residence, Los Angeles
A. F. Rosenheim, Architect, Los Angeles

Dr. H. Kugeler Residence, San Francisco
T. Patterson Ross, Architect, San Francisco

Jacob Stern Residence, San Francisco
Houghton Sawyer, Architect, San Francisco

Dr. Alfred Raymond Residence, Seattle
J. C. Cote, Architect, Seattle

Public Library, Albina Branch, Portland, Oregon
Ellis F. Lawrence, Architect, Portland



Floor Plans, Public Library, Albina Branch, Portland, Oregon
Ellis F. Lawrence, Architect, Portland

Entrance

Window

Public Library, Albina Branch, Portland, Oregon
Ellis F. Lawrence, Architect, Portland

Reading Room

Office

Public Library, Albina Branch, Portland, Oregon
Ellis F. Lawrence, Architect, Portland

LOGGIA TO COLUMBARIUM, CYPRESS LAWN CEMETERY
B. J. S. Cahill, Architect, San Francisco

The exterior of this Loggia is worked out in Manti limestone upon a granite base. The doors are of cast bronze straight from the sand and finished Pompeian green. The cornice is of copper. The soffit panels will be of gold and verdigris. The mosaic floor is bordered with Belgian black and verde antique marbles in harmony with the cool metallic greens of the doors and cornice.

Photo, Gabriel Moulin

Frederick Hohwiesner Residence, 2160 Lake Street, San Francisco
Nathaniel Blaisdel, Architect, San Francisco

Photo, Gabriel Moulin

Missouri Building, P. P. I. E.
H. H. Hohenschild, Architect, St. Louis, Mo.

(Continued from Page 224.)

Has the architect kept pace with business efficiency? Many of the large offices in the big cities can be pointed to as models of efficient business management and in some instances their methods of transacting business and documents have been published in the architectural journals. However, the man of medium practice is often careless, if not negligent, as to the business conduct of his office, and unfortunately for himself is lamentably ignorant of matters which concern him very deeply.

We refer more particularly to the cost of his own work, the proportion that overhead expenses should bear to the work in hand, the value of his services, the proper fees, the legal knowledge to conform with the laws of the community in which he practices and the absolute necessity of keeping proper records of his transactions with clients and contractors. To this might commonly be added a proper knowledge of the ethics of his profession and of his rights and obligations as related to the client.

The writer has had many opportunities to observe the discomfiture of architects, placed on the witness stand in court proceedings on their own behalf, due to their inability to answer fundamental questions or produce records of business transacted in their offices.

In this connection it might not be out of place to say that more often than not, the judge, attorneys and gentlemen of the jury are densely ignorant of what good architectural practice is, and if they are in a receptive frame of mind and expect enlightenment from the architect, are many times subject to grievous disappointment. For the architect's ignorance, he, as an individual, is not altogether to blame, as there appears to be a serious lack of means of education on the topics mentioned, and scant material from which he can gather knowledge.

The architect with the "artistic temperament" will perhaps scorn this knowledge as beneath him, but if he would only realize that the simplest business methods would grease the way for the easy transaction of the "business" which he despises, and would leave him much more time for contemplation, it would often spare him the interruption of a grand inspiration by the injection of a very sordid piece of business, brought about by his negligence in the conduct of the affairs of a client to whom he was obligated.

The length of this article will not permit the amplification of efficient business methods, but it is comparatively easy to inaugurate a system which would take care of all the business of the office with an expenditure of but little labor. Cards should be kept for draughtman's time, indicating rate of wages and time consumed on different commissions. Each commission in the office should be numbered and all reference to the commission should be by number. All sheets of drawings should have the commission number and a number for each sheet, which should be a matter of record. Further record should be kept of all blue-prints and the cost of the same. The essential parts of all building contracts should be entered on cards and all payments made on account of the contract should likewise be entered. A diary should be kept of all visits of clients and visits of inspection of the architect. If a superintendent is employed, he should make a daily record embracing conditions on the buildings, number of men employed and class of work under construction. A set of books should be kept showing all receipts and expenditures. A record of all commissions indicating the cost of draughting, blue-prints, typewriting and proportion of overhead expense should be maintained so that the architect may have some idea as to what his work is worth and the profit, if any, he makes. Duplicates should be kept of all correspondence and no orders to contractors should be given except in writing, and if requiring the owner's signature to be in triplicate and countersigned by him. Receipts should be taken for all drawings given out from the office. The architect should acquaint himself with a definite knowledge of the legal forms with which he has to do and of the laws governing his practice and responsibility. He will find that much of the information on legal questions which he has had, particularly from contractors and laymen, is pure hearsay and not founded on either legal decision or precedent.

An adherence to simple business principles will save the architect much worry and very often deep humiliation and financial loss. It will gain him the respect of all with whom he has business dealings, and after all is said, the carrying on of the profession depends on our business relations.

Let us hope, without wishing to be accused of commercialism, that those who have in hand the education of our future architects, will devote a little time to instilling in the youthful mind a small part of pure business training and efficiency.

Description of Judson C. Rives' Residence

Situated at the northeast corner of Westchester Place and Twelfth Street, Los Angeles, and nearing completion is the two-story, all brick, residence of Mr. Judson C. Rives, retired Southern lumber merchant. The lot on which the house is located fronts 160 feet on Westchester Place and 150 feet on Twelfth Street, adjoining the residence of A. F. Rosenheim, Architect, from whose plans and under whose supervision the Rives house has been erected, a year having been required for the purpose.

The house occupies an extreme ground area of 88 feet by 92 feet, including porches and projections. The exterior walls are faced with what is known as "Tapestry or Ruffled" brick of standard size in shades of light, medium and dark red so placed as to emphasize the "Flemish" and Diamond bonds employed. The joints, ¾" in width of white mortar, are raked out to a depth of ¾" so as to give good play of light and shade and strong shadow under each course of brick. In the spandrels of the arches of the front porch, Porte-Cochere and arched openings in the main walls, a touch of color has been introduced in the shape of encaustic tile, which lends a very pleasing effect.

The style of the house may be regarded as an example of "Italian" brick work. The roof covering is of a rich, red clay tile of "Italian" form. The trimmings, such as cornices of porches, keystones and skew-backs of arches, etc., are of a light cream colored terra cotta, making a fine contrast with the red brick and tile. Dressed granite of a native light gray variety has been used for the steps, base, door sills and wheel guards.

Terraces and covered porches extend from the solarium on the east to the dining room on the south, a distance of 152 feet, and are floored with a six (6") inch square "Red" Welch Quarry tile, laid with wide cement joints.

The entrance on Westchester Place is through a covered porch ten (10') feet wide and a deep vestibule, fin-

ished entirely in richly colored marbles—floors, walls and ceiling—which opens directly into the reception hall, seventeen (17′) feet wide and thirty (30′) feet deep, the stairs starting at a point fifteen (15′) feet back from the door with a central flight six (6′) feet in width, extending to a broad landing the full width of the hall and continuing to the second floor with double flights, the hall in the second story being of the same dimensions as that in the lower story. The treads and landings of the stairs, as well as the hand rails of the balustrades, are of select mahogany, while the balusters and the balance of the stairway is of birch, finished in harmony with the wood work of the halls.

To the right or south of the main hall is located the library, a room 15 feet by 17 feet, trimmed in quartered white oak of Flemish finish, with paneled wainscoting 4½ feet high and neatly moulded architraves around the doors and windows.

To the left or north of the main hall is the drawing room, 17 feet by 22 feet in size, designed in the style of "Louis XV," with delicately modeled and ornamented pilasters supporting the highly ornamented stucco cornice, all ornament being high-lighted with gold-leaf glazed to an old bronze effect to match similar finish of the furniture, which is of Circassian walnut, designed in the same period. The mantel is of pure white statuary marble elaborately carved.

Adjoining the library on the east is the dining room, 20 feet by 23 feet, with circular bay-window toward the south, and is finished in "Tabasco Mahogany," with very dark stain to match the furniture, which has been especially made. There is no built-in furniture as it is not customary now to use fixed furniture in the principal rooms of the better class of houses.

From the main hall, on the east side of the stairway, one enters the breakfast room, which is circular in form, 12 feet in diameter with an elliptical vaulted ceiling. The woodwork is of birch, enameled white.

On the west of the stairway, the hall communicates with the Solarium, 15 feet by 27 feet, finished in light-stained Oregon Pine, with beamed and paneled ceiling, the floor being of green Hexagon "Encaustic" tile and the walls covered with an olive green "Grueby" tile, set with wide joints. An all-tile mantel, on the west side, in which specially molded and colored "Grueby" tiles have been introduced, produces an effect quite as unusual as it is satisfactory.

The second floor contains four principal bedrooms, two of which are for the owners and two for guests, each provided with individual bath and dressing rooms.

All floors throughout the house are of polished quartered white oak, except in the service department, where pine has been used for covering with linoleum.

The garage is built of brick, with tile roof, and is designed in perfect harmony with the house. It occupies a ground area of 26 feet by 48 feet.

Destruction of Rheims Cathedral

BY WHITNEY WARREN*

A Careful Study: "I arrived at Rheims at 4:30 on Saturday afternoon, the 26th, and proceeded directly to the cathedral, where I remained until dark talking with the Curé Landrieux and the Abbé Thuot, in charge of the monument. The next morning I was again at the cathedral from 7:30 in the morning until 4:30 in the afternoon, visiting it in every particular—endeavoring to realize the damage done and whether intentionally inflicted or not.

"The following is as near as I was able to ascertain the different phases of the bombardment:

"On September 4, when the Germans first entered, there was a first bombardment by their guns, interpreted by the Germans either as a mistake or caused by the jealousy of some corps not allowed that privilege. Four shells fell upon the cathedral, one on the north transept, but doing little damage.

"On the 14th and 16th, after the Germans had evacuated, the bombardment recommenced, but without touching the cathedral.

"On the 17th, two shells struck, one on the apse, the other on the north transept. On the 18th again the cathedral was hit on the southern flying buttresses and on the roof, killing a gendarme and several Germans wounded.

"On the 19th the cathedral was fairly riddled by shells during the entire day, and about 3:45 the scaffolding surrounding the north tower caught fire. This fire lasted about one hour, and during it two further shells struck the roof, setting it on fire.

Spread of the Fire: "The fire from the scaffolding descended until it reached the north door of the main façade, which caught fire rapidly, burst through, and communicated the fire to the straw with which the floor of the cathedral was covered. This straw had been ordered on the 12th by the German commander in order to prepare the cathedral to receive 3,000 German wounded, but the evacuation of the city by the Germans had prevented the cathedral being used for that purpose.

"When the French came, the straw was gathered together with the intention of removing it, but on the 17th the French general ordered it respread, the flag of the Red Cross hoisted on the north tower, and the German wounded placed there in the hope that this might save the cathedral.

"As I have said, on the 19th the straw caught fire from the fire originating on the scaffolding, burning what are known as the fiery fine wooden tambours surrounding the doors, and destroying, by calcinating, the extraordinary stone sculptures decorating the entire western façade. The sculptures were peculiar to Rheims, being in high full relief and cut out of the stone itself, instead of being applied. This is one of the irreparable destructions occasioned.

"All the wonderful glass of the nave is absolutely gone. That of the apse still exists, though greatly damaged.

"The fire on the outside calcinated the greater part of the façade, the north tower and the entire clerestory, with the flying buttresses and the turrets crowning each of them.

Decorative Work Destroyed: "The stone, as far as its surface is concerned, is irreparably damaged and when touched detaches itself. Consequently all decorative motives wherever the flames reached are lost.

"The treasure was saved at the commencement of the fire by the priests, and the tapestries had been fortunately removed before. Half the stalls have been de-

*E. N. Mr. Warren is a well known New York architect and his description of the destruction of the famous cathedral will no doubt be of interest to the profession.

stroyed. The organ is intact and several crucifixes and pictures in the apse are untouched.

"That anything remains of the monument is owing to the strong construction of what might be called the carcass of the cathedral and, I am firmly convinced, through no desire of the bombarding forces to spare the monument. The walls and vaults are of a robustness which can resist even modern implements of destruction.

"Even on the 24th, when the bombardment was again taken up, three shells landed on the cathedral, one on the tower, one on the vault of the choir, and one on a buttress of the south. The vaults resisted absolutely, not even being perforated.

"Had the cathedral of Amiens received the same bombardment, because of the lightness of its construction, the vaults would undoubtedly have given away, the flying buttresses would have crushed in the walls and nothing would have remained with the exception of perhaps the ruins of the towers.

No Desire to Spare It: "If anything therefore remains of Rheims Cathedral, it is due, as I have said, to the robustness of its construction and not to any desire on the part of those bombarding it to spare it from utter destruction.

"The monument, about which no troops were massed, towers above all the rest of the town. To avoid it, in view of the uselessness of destroying it and because it was serving as a hospital, would have been an easy matter.

"The entire quarter of the city situated between it and the enemy is destroyed, including the Episcopal palace, which contained the archæological museum, the Episcopal chapel and what was known as the Apartment of the Kings. This quarter also contained the principal commercial houses.

"There are two monuments of almost equal importance to the world which are in jeopardy of the same fate as the Cathedral of Rheims, namely the Cathedrals of Noyon and of Laon. That these shall be respected is to be hoped in spite of the ruthless and miserable attempt to reduce the glorious monument of Rheims to ruins.

"On Friday, the 25th, the Germans further shelled the Abbaye of Saint Rémy at Rheims, one shell exploded in the interior and destroyed an immense quantity of the glass. The civil hospital alongside received as its guests nine shells, one of which killed four of the patients in their beds and another one of the attendants.

"Needless to say that over this building also was flying the flag of the Red Cross."

Metropolitan Exhibit Holds Opening

The formal opening of the Metropolitan Exhibit of building materials was held in the Metropolitan Building in Los Angeles last month. Fully twenty-five hundred people attended this opening, including many architects, contractors and others engaged in building.

The exhibit was in charge of Miss M. L. Schmidt, who is responsible in no small manner for its success. She was assisted at the formal opening by representative architects and contractors and material men.

Ninety firms dealing in building materials and equipment installed displays, the purpose of which is to afford those who are directly or indirectly concerned with building operations, the opportunity of finding in a single and permanent location all the construction and furnishing specialties in which they may be interested.

This formal opening took on the aspects of a reception, in which both men and women of Los Angeles and vicinity were guests. The rooms were handsomely decorated with ferns and flowers, and a most pleasing orchestra assisted greatly in the success of the affair.

The Metropolitan Exhibit will be a permanent institution of Los Angeles. It will be open every day, and will serve as similar institutions, being conducted in Eastern cities, where architects and builders, as well as material men, may take their friends and prospective clients to show them in more concrete form, building appliances and applied building materials.

The exhibit was an immediate success, and promises to maintain its high popularity. Even to the uninterested the exhibit should hold much of value and instructive information. Great credit is due Miss Schmidt for her clever work in this connection—a big man's job at any time. Miss Schmidt is most versatile, and besides being a good organizer, as she surely must be, she demonstrated at the opening that she is also a most interesting talker. Miss Schmidt publicly addressed the large gathering present, outlining the aims and aspirations of those people interested, and behind the founding of this exhibit.

Contracts for space have been let for one year, at the termination of which it will be decided whether or no the exhibit is to be continued indefinitely. However, this is of minor consideration, as the business men of Los Angeles, by their earnest co-operation and interest in the movement, have already shown that it will continue in a most satisfactory and successful manner.

The Metropolitan Exhibit in Los Angeles, probably marks the first permanent efforts along this line that have been tried out on the Pacific Coast. The plan is a good one, and has proven its worth in New York and Chicago. It is a great aid and leverage in provoking business. Considering the small amount of money involved it is an excellent idea for any community. It works for greater harmony in the building line, and operates for fewer misunderstandings in construction activities.

Everything entering into the construction and equipment of a building has been assembled upon the floor of the Los Angeles exhibit rooms. On the face of it, it can be seen that such an exhibit has many advantages for an architect who may take his client to the exhibit rooms, and in a quick and definite manner, make selections for equipment and appliances.

That the architects of Southern California are interested in this exhibit is at once evidenced by a letter from the Southern California Chapter of the American Institute of Architects, which has been received by Miss Schmidt. It is our pleasure to herewith publish a copy of this letter:

Los Angeles, Cal., October 14, 1914.

Metropolitan Exhibit.
Sixth Floor, Metropolitan Bldg.,
Los Angeles, Cal.

Dear Miss Schmidt: The Southern California Chapter of the American Institute of Architects at their monthly meeting, held October 13th, passed an unqualified indorsement of your architectural exhibit. We have con-

sidered it a most useful institution and one which benefits not only the architects but also the dealers in building materials and the general public, and we intend to give the Metropolitan Exhibit our hearty support and to use this medium for the inspection of building materials, finishes, appliances, etc.

Very truly yours,

AMERICAN INSTITUTE OF ARCHITECTS,
SOUTHERN CALIFORNIA CHAPTER,
A. C. MARTIN, President.

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As further indication of the faith which Los Angeles business men hold for the success of the exhibit, we also show here a list of firms who were active participants in the opening ceremonies at the exhibit. A glance at the following names will show the comprehensive scope of the work as undertaken.

Angelus Dumbwaiter Co.
American Radiator Co.
Anchor Plastic Stone Co.
Atlantic Terra Cotta Co.
Application Co. of America
Anglo Range & Refrigerator Co.
Buttonlath Co.
Barker Bros.
Bradford Dumbwaiter & Elevator Co.
Boyle-Dayton Co.
California China Products Co.
Collins, B. V.
Carrette, Adolphus
City Planning Association
Cole Mfg. Co.
Crystal Needle Shower Co.
Central Hardware Co.
California Furniture Co.
Day & Night Solar Heater Co.
Davidson, J. L., Metal Equipment.
Dellamore Turntable Co.
Fuller, W. P. & Co.
Fess System Co.
Herrmann, Eugene Co.
Hipolito Screen Co.
Humphrey Water Heater Co.
Herringbone Metal Lath Co.
Howard & Smith
Hill Chemical Co.
Hall Gas Floor Furnace Co.
Hammond Lumber Co.
Hoyt Water Heater Co.
H. H. Hamilton Art Stone Co.
Hadden Sprinkler
Improved Sanitary Fixture Co.
Judson Art Glass Co.
Kennard, J. A.
Library Bureau
L. A. Desk Co.
L. A. Ice & Cold Storage
L. A. Show Case & Fixture Co.
L. A. Cement Gun Co.
L. A. Pressed Brick Co.
Mathews Paint Co.
Mardon & Balough
Monarch Screen Co.
Monarch Supply Co.
Montgomery & Mullin
Meyberg Co.
Ohio Varnish Co.
Panama Electric Lamp Co.
Pacific Sewer Pipe Co.
Pacific Heater Mfg. Co.
Paraffine Paint Co.
Pitchford Gas Furnace Co.
Pacific Sash & Door Co.
Pittsburg Water Heater Co.
Pacific Orn. Iron Co.
Perfect Concealed Ironing Board
Pacific Mineral Products
Quinn, J. E.
H. Raphael Co.
Rommel Mueller Co.
Rector System Gas Heating Co.
Refrigeration Plants Co.
B. F. Sturtevant
So. California Hdwd. Co.
Standard Screen Co.
Standard Door & Sash Co.
Sil-O-Cel Co.
Shelby Window Mfg. Co.
Steele, W. H.
Simons Brick Co.
Schaer Brothers
Todd Chase Co.
Unex Cooler.
Western Blind & Screen Co.
Waterhouse & Price
Wood, S. Lewis
Wybro, H. C.
B. H. Wedemeyer & M. M. Nelson
White Atlas Cement Co.

INDUSTRIAL INFORMATION

Architect E. A. Neumarkel, has moved his office from 948 Market Street, to Room 521 Sharon Building, San Francisco.

Warren Chas. Perry, Architect, has opened an office in the Atlas Building, 604 Mission Street, San Francisco.

W. E. Shirmer, formerly with C. W. McCall, Oakland, and Maxwell G. Bugbee, formerly of the firm of Bugbee & Bugbee of San Francisco, have joined forces under the firm name of Shirmer & Bugbee, with offices at 519 Dalziel Building, Oakland. Samples, catalogues and circulars are requested.

Architect Alfred F. Rosenheim, with offices in the H. W. Hellman Building, Los Angeles, Cal., was a recent visitor in San Francisco.

Wright & Rushforth, Architects, have moved their offices to the E. W. Hopkins Building, 354 Pine Street, San Francisco.

L. D. Cox has resigned his position as landscape Architect of the Los Angeles Park department. He has been appointed Assistant Professor and Architect in Syracuse University, New York.

One of the oldest and most influential organizations in America, The National Brick Manufacturers' Association, will hold its annual convention in Detroit, Michigan, in 1915. The exact date and particulars of the convention will be announced later.

Following their marriage at Seattle on October 10th, Architect Joe Estep of Los Angeles, and Miss Gladene Rankin of Spokane, have returned to Los Angeles, where they will make their permanent residence. Mr. Estep is connected with the office of Architect L. R. Kelly, Story Building.

Architect Hubert Frohman, of Frohman & Martin, Pasadena, who was in Europe at the opening of hostilities, has returned home.

In the November issue of this journal, through the error of a proofreader, we inadvertently misspelled a word in Mr. Huntington's article, "The Development of Vertical Transportation," which conveyed a different meaning than that intended by the author. We herewith republish the sentence in question with the corrected word in italics: "This avoids fastening the cables to the driving mechanism—see description of gearless traction elevators for method of roping—and makes it **impossible** (was written possible), for the car or counterweight to be forced into the overhead work, through the failure of the ordinary limit stops."

M. E. Dutwiler, general jobber, 810 East Seventh Street, Los Angeles, Cal., is now putting on the market a new gas heater that will be ready for distribution about the first of the year.

This heater is so constructed that it is imbedded in the floor of a residence, which installation is said to be particularly satisfactory for this sort of work. Mr. Dutwiler anticipates a very good sale of this product.

Gladding, McBean & Co. furnished the Matt Enamel Architectural terra cotta on the Albina Library, Portland. Ellis Lawrence of that city was the architect.

The Pacific Sewer Pipe Company of Los Angeles has entered the field of glazed and enameled brick.

They have recently shipped their white enameled into Salt Lake City and are now furnishing them to the new government building in Pasadena. The Stowell Hotel in Los Angeles is faced with their transparent green glaze, with cream terra cotta, and their brown matt is specified for the new Robinson Building, now in process of construction, one of the largest in that city.

They are making the white and ivory in both bright and matt glazes and some of the darker matts.

The quality of their material is high, the brick being made of a clay which burns dense, and their glaze kilns being constructed to permit a high heat on the second

burn, producing a hard glaze, homogeneous with the brick.

At a recent test for the crushing strength of the brick, the enamel had shown no sign of peeling when the brick crushed under a pressure of 93,000 pounds.

This company has six plants in Southern California, and is the pioneer in sewer pipe and firebrick in that section, the first plant having been built twenty-seven years ago.

In their new line they seem to be aiming at the same excellence in quality which has characterized their older products.

Architect Fernand Parmentier, Secretary of the Southern Chapter of the American Institute of Architects, and well known throughout California, has written to friends here, from France, where he is serving in the French Army.

Mr. Parmentier left Los Angeles last summer intending to visit in Alsace, but during his crossing of the Atlantic the war broke out, and immediately upon his arrival in France took up arms for his country. It is with pleasure that we can give space to the following letter, addressed to A. C. Martin, President of the Southern Chapter, knowing that it will be read with much interest by the many friends of Fernand Parmentier:

"My dear Albert:

"After days under fire I find time for these few lines to greet you and all the Chapter members, and to let you know that I am still among the living and that the shells and shrapnels have so far dodged my head. Indeed it seems to me that I shall miss their hum and whistle through the air when I return again to my peaceful vocation in California.

"This strenuous existence has benefited me physically and I may say that I feel stronger and heartier than ever after my experience in long marches and days and nights passed in fields and trenches during rain and cold and alternate sunshine.

"I hope that I may soon be at liberty again and be among you to tell of my novel and interesting experiences.

Sincerely yours,

FERNAND PARMENTIER."

CALIFORNIA.

San Francisco—Architect Henry C. Smith, Humboldt Bank Building, San Francisco, has completed plans for a two-story and basement, reinforced concrete residence for Mrs. Clarence Musto, to be erected at the corner of Vallejo and Devisadero Streets at a cost of $45,000.

San Francisco—Architect C. O. Clausen, Hearst Building, San Francisco, has completed plans for a six-story and basement steel and brick apartment house for George Bennett, to be erected on the south side of Eddy Street, near Leavenworth, at a cost of $100,000.

San Francisco—Architects Bakewell & Brown, 251 Kearny Street, San Francisco, have about completed plans for a five-story and basement Class A hospital addition, to be erected on Webster Street, between Sacramento and Clay. It will cost $150,000.

San Francisco—Architects Rousseau & Rousseau, Monadnock Building, San Francisco, have completed plans for a six-story and basement, brick and steel apartment house, to be erected on the east side of Mason Street, north of Sutter, at a cost of $50,000.

San Francisco—Architect Lewis P. Hobart, Crocker Building, San Francisco, has completed plans for a hospital group of four and six-story buildings, Class A construction, for the University of California, to cost $600,000.

Los Angeles—Architect Fred A. Hale, 644 San Fernando Street, Los Angeles, has completed plans for a one-story and basement, brick and steel laundry building for the Los Angeles Laundry Company, to cost $35,000.

Los Angeles—Architect Frank M. Tyler, 907 Black Building, Los Angeles, has completed plans for a two-story and basement frame and plaster residence in Lafayette Square for Mrs. M. Wiley. It will cost $25,000.

Oakland—Architect Oscar Haupt, Phelan Building, San Francisco, has completed plans for a group of one and three-story and basement, brick and reinforced concrete old people's home buildings for the California Altenheim. The buildings will be in the nature of an addition to the present building at Fruitvale and Hopkins Streets, and will cost $50,000.

Stockton—Architect Henry H. Meyers, Kohl Building, San Francisco, has completed plans for a three-story and basement, Class C construction hotel and stores for R. E. Wilhoit & Son, at a cost of $40,000.

Redwood City—Architects Bliss & Faville, Balboa Building, San Francisco, have about completed plans for a two-story and basement frame residence for Jacob Stern, to be erected on property adjoining the home of Louis Stern, at a cost of $30,000.

Beverley Hills, Los Angeles County—Architect W. J. Dodd, Marsh-Strong Building, Los Angeles, is preparing plans for a one and two-story and basement, brick dwelling for Roland Bishop. It will cost $75,000.

Richmond—Architects Stone and Wright, Stockton, have completed plans for a two-story and basement, brick or hollow tile school building, for the Richmond School District. It will cost $50,000.

Sacramento—Architect R. A. Herold, Forum Building, Sacramento, has completed plans for a hospital group of two and four-story and basement buildings for the County of Sacramento, to cost $70,000.

Palo Alto—Architects Bakewell & Brown, 21 Kearny Street, San Francisco, have completed plans for a one-story and basement, brick men's gymnasium building for the Leland Stanford, Jr., University. It will cost $100,000.

Woodland—Architect W. H. Weeks, 75 Post Street, San Francisco, is preparing plans for a two-story and basement reinforced jail, to be erected on property adjoining the present Yolo County Court House for the County of Yolo, at a cost of $40,000.

Ventura—State Architect George B. McDougall, has completed plans for a hospital cottage and two typical cottages, concrete and frame, for the State of California, at a cost of $79,972.

Colton—Architects Allison & Allison, Hibernian Building, Los Angeles, have completed plans for a two-story and basement brick school building for the Colton School District, to cost $75,000.

OREGON.

Portland—Architects Tourtellotte & Hummel, Rothchild Building, Portland, are preparing plans for a two-story and basement, reinforced concrete church building for the First Methodist Church, to be erected at the corner of Fourteenth and Taylor Streets, at a cost of $40,000.

Eugene—Architects Hunzicker & Preusse, Eugene, have completed plans for a one-story and basement, reinforced concrete armory building for the State of Oregon. It will cost $60,000.

Portland—Architect F. A. Naramore, Court House, Portland, has completed plans for a two-story and basement, brick and reinforced concrete school building for the city of Portland, to be erected at the corner of Twentieth and Hoyt Streets, at a cost of $160,000.

Portland—Architects MacNaughton & Raymond, Title and Trust Building, Portland, have completed plans for a four-story and basement reinforced concrete and brick warehouse and factory, for Blake-McFall Paper Company. It will cost $90,000.

Athena—Architects Tourtellotte & Hummel, Rothchild Building, Portland, have completed plans for a two-story and basement brick school building for the Athena School District, to be erected at a cost of $35,000.

WASHINGTON.

Seattle—Architect W. Somerville, White Building, Seattle, has completed plans for a two-story and basement, brick and steel library for the city of Seattle, to cost $30,000.

Seattle—Architect David J. Myers, Central Building, Seattle, is preparing plans for a two-story and basement, frame and hollow tile, residence for M. A. Arnold, to be erected in the Highlands Tract at a cost of $35,000.

Tacoma—Architect E. F. Champney, Hay Building, Seattle, is preparing plans for a four-story and basement, reinforced concrete lodge hall for the Tacoma Elks' Hall Association. It will cost $100,000.

Columbia City—Architect W. Marbury Somervell, White Building, Seattle, has completed plans for a one-story and basement library for Columbia City. It will be of brick and concrete construction and will cost $40,000.

Asbestos Building Lumber Imperishable

We show on this page examples of high-class suburban residences in which the use of Asbestos Building Lumber is highly exemplified. Experts proclaim asbestos to be the natural reinforcement for cement. It resists climate, fire and time. It improves with every day it is exposed to the weather, absorbing a little moisture from the atmosphere at first and maturing like every other concrete.

Asbestos Building Lumber sheets are meritorious and are superior to ordinary "stucco," with far more beautiful effects. Being fireproof and not affected by continu-

ous moisture, frost, or subject to deterioration by the elements in any way, it is obvious that Asbestos Building Lumber may be employed freely and confidently in a vast variety of places where ordinary lumber has failed.

Primarily designed to replace the ordinary sheathings only, its merits have been found to be such that its employment by leading architects has extended to all classes of work wherein its many desirable qualities have supplanted other materials heretofore commonly in use.

Nails may be driven through Asbestos Building Lumber, by a quick sharp blow of the hammer, quite close to the edge without danger of fracture, thus differing materially from all other sheathing materials in the important attribute of toughness and homogeneousness, in addition to its other qualities.

Asbestos Building Lumber is a product of The Keasbey & Mattison Co. of Ambler, Pa.

THE PACIFIC COAST ARCHITECT is the official organ of the San Francisco Chapter of the American Institute of Architects.

San Francisco Chapter, 1881—President, G. B. McDougall, Russ Building, San Francisco, Cal. Secretary, Sylvain Schnaittacher, First National Bank Building, San Francisco, Cal.
Chairman of Committee on Public Information, William Mooser, Nevada Bank Building.
Chairman of Committee on Competition, Geo. B. McDougall, 235 Montgomery Street.
Date of Meetings, third Thursday of every month; annual, October.

OTHER PACIFIC COAST CHAPTERS OF THE AMERICAN INSTITUTE OF ARCHITECTS.

Southern California Chapter, 1894—Vice-President, A. C. Martin, 430 Higgins Building, Los Angeles, Cal. Secretary, Fernand Parmentier, Byrne Building, Los Angeles, Cal.
Chairman of Committee on Information, W. C. Pennell, Wright & Callender Building, Los Angeles.
Date of meetings, second Tuesday (except July and August), (Los Angeles).

Oregon Chapter, 1911—President, Morris H. Whitehouse, Wilcox Building, Portland, Ore.
Secretary, Ellis F. Lawrence, Chamber of Commerce Building, Portland, Ore
Chairman of Committee on Public Information, Ellis F. Lawrence.
Date of meetings, third Thursday of every month, (Portland); annual, October.

Washington State Chapter, 1894—President, James Stephen, 726 New York Block, Seattle, Wash. Secretary, Arthur L. Loveless, 513 Colman Building, Seattle.
Chairman of Committee on Public Information, Chas. H. Alden, 513 Colman Building, Seattle (till further notice send all communications to Arthur L. Loveless, 513 Colman Building, Seattle).
Date of meetings, first Wednesday (except July, August and September), (at Seattle except one in spring at Tacoma); annual, November.

Colorado Chapter, 1892—President, George H. Williamson, 528 Majestic Building, Denver, Colo. Secretary, Arthur A. Fisher, 459 Railway Exchange Building, Denver, Colo.
Chairman of Committee on Public Information, Arthur A. Fisher, 459 Railway Exchange Building, Denver, Colo.
Date of meetings, first Monday of every month (Denver, Colo.); annual, September.

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SAN FRANCISCO CHAPTER, A. I. A.

The regular monthly meeting of the San Francisco Chapter of the American Institute of Architects was held at the Techau Tavern on Thursday evening, November 19, 1914.

The meeting was preceded by a dinner tendered to the artists and sculptors of San Francisco.

The following members and invited guests were present:

CHAPTER MEMBERS.

Allen, Harris
Applegarth, George A.
Bakewell, John, Jr.
Boese, Frederick D.
Bliss, Walter D.
Blohme, J. Harry
Brown, Arthur, Jr.
Cahill, B. J. S.
Coffey, Alfred I.
Crim, William H., Jr.
Day, Clinton
Dolliver, J. W.
Faville, William B.
Hatch, John Davis
Headman, August G.
Joseph, Bernard J.
Lichtenstein, Milton
Mathews, Edgar A.

INVITED GUESTS.

Bateman, John
Bonestell, C. K.
Brugiere, F. J.
Burgdorf, Ferdinand
Cadenasso, Guiseppe
Crenier, Henry J.
Cummings, Earl
Dickman, Charles J.
Deneville, Paul
Dixon, Maynard
Eberhardt, Robert G.
Ellingwood, F. L.
Fairweather, Julian
Jaegers, Walter
Joullin, A.
Larsen, F. L.
Latimer, L. P.
Lawrence, H. J.
Manatt, A. F.
Martinez, Xavier
Mathews, Arthur
McDougall, C. C.
McDougall, George B.
Mitchell, William Garden
Molera, E. J.
Mooser, William
Newman, William A.
O'Brien, Matthew
Polk, Willis
Ross, T. Paterson
Peters, Charles Hollo
Piazzoni, Guiseppe
Porter, Bruce
Putnam, Arthur
Redmond, Owen
Roth, F. G. R.
Simpson, Horace G.
Sparks, Will
Stackpole, Ralph
Stearns, H. C.
Swain, Clarkson
Tilden, Douglas
Weinert, Albert
Wores, Theodore
Whelan, Edgar

The meeting was called to order by Mr. Faville, the President, at 8:30.

On motion duly made, seconded and carried, the reading of the Minutes and all other business, was deferred until the next Chapter meeting.

During the course of the dinner, Mr. Faville called on Mr. Clinton Day to toast the guests of the evening. Mr. Willis Polk welcomed the guests and emphasized the close relationship of the painter, sculptor and the architect.

Mr. T. Paterson Ross recited some humorous Scotch stories, which were greatly appreciated.

Mr. James W. Reid responded to the toast of the "Ladies."

Messrs. Bliss, Applegarth, Allen and Larsen rendered songs during the proceedings, which were gotten up for and which were singularly appropriate for the occasion.

Mr. B. J. S. Cahill read a scholarly paper, which was listened to with marked attention. He made a plea for peace and harmony amongst the sculptors, artists and architects; to bring about a closer relationship between them, and showed that the accomplishments of the ancients were due to the fact that the arts were not a thing apart, but a part of the life of the people, and that the modern estrangement of art and life is partly due to the sequestration of the artists and craftsman. He closed his remarks by saying that if we have the fighting habit, we should apply it to the fight against false standards. "We have seen how great masses of mankind are facing death for an ideal. We are not called upon for such heroic extremes, but we can at least face failure in a wordly sense, than failure in our ideals. We can at least, if we have no private ideals of our own, live up to the standard of the American Institute of Architects."

Mr. Cahill was followed by Mr. Arthur Mathews, who spoke for the artists. Mr. Mathews laid stress upon the necessity of a better understanding between the arts and a freer discussion of the faults and virtues of each and that their ideals were identical and that they should understand each other better.

A paper by Mr. A. Sterling Calder, Acting Chief of the Department of Sculpture, was read by Mr. Faville, owing to Mr. Calder's absence. His paper contained much constructive criticism that should bring the architect and sculptor to a better understanding of each other's aims.

A very interesting and informal discussion took place between the architects and culminated in a suggestion that committees be appointed from each of the arts to bring about a closer relationship between them and also to provide meetings such as this in the future.

Some ideas of Mr. Douglas Tilden, the sculptor, were read by Mr. Willis Polk.

Attention having been called to the address of Mayor Harrison of Chicago, that the City Council provide $5,000 annually for purchase of a modern work of art, it was suggested that a movement be started for similar action by the municipal authorities of this city.

Mr. William B. Faville, the President, was unanimously voted the thanks of those present for the effective and successful manner in which the affair had been handled.

The meeting adjourned at 10:30 p. m.

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SOUTHERN CALIFORNIA, A. I. A.

The seventy-sixth meeting of the Southern California Chapter of the American Institute of Architects was held at the Hollenbeck Cafe, Los Angeles, on Monday, October 26, 1914.

The meeting was called to order at 7:50 p. m. by President A. C. Martin, the following members being present: J. C. Austin, J. J. Backus, F. P. Davis, Theo. A. Eisen, P. A. Eisen, Chas. S. Greene, Elmer Grey, Myron Hunt, J. W. Krause, A. C. Martin, B. M. Morris, Octavius Morgan, O. W. Morgan, S. T. Norton, Robert H. Orr, T. E. Power, A. F. Rosenheim, W. J. Saunders, F. R. Schaefer, J. T. Vawter, August Wackerbarth, A. R. Walker.

As a guest of the Chapter was present Mr. C. H. Whitaker, editor of the Institute Journal, who was present to lay before the Chapter the subject matter of the evening.

A communication was read from the Illinois Chapter of the American Institute of Architects inviting delegates from the Southern California Chapter to join with them in Chicago and continue their journey to Washington, D. C., in a body.

Upon motion, made by Mr. Morgan, seconded, and duly carried, the secretary was instructed to communicate with the Illinois Chapter, stating that in so far as possible the members would endeavor to carry out the indicated program, but that no definite assurances could be made for the delegation as a whole.

Following this communication, Mr. C. H. Whitaker, the editor of the Journal, was introduced by the chairman, and addressed the Chapter on the policies outlined by the Committee on Publications for the management of the Journal.

Mr. Whitaker outlined the advertising, subscription and editorial plans which were being carried out, in a most thoroughly convincing manner, and called upon the Chapter members for their united support in furthering his great work.

Following Mr. Whitaker's talk a general discussion was entered into by various members of the Chapter.

Upon motion, made by Mr. Austin, seconded by Mr. Morgan, the Chapter voted to subscribe for six additional copies of the Journal for the use of the Committee on Public Information.

Moved by Mr. Austin, seconded by Mr. Rosenheim, a hearty vote of confidence in all the Journal methods was extended and further, a vote of thanks rendered to Mr. Whitaker for his very able and interesting address.

The meeting adjourned at 9:40 p. m.

FERNAND PARMENTIER,
Secretary.

(Signed) By A. R. WALKER,
Acting Secretary.

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The seventy-seventh meeting of the Southern California Chapter of the American Institute of Architects was held at the Hollenbeck Cafe, Los Angeles, California, on Tuesday, November 10, 1914.

The meeting was called to order at 7:30 p. m. by President A. C. Martin.

The following members were present: J. E. Allison, J. J. Backus, Lyman Farwell, P. H. Frehman, Chas. S. Greene, J. C. Hillman, E. D. Hudson, J. W. Krause, J. P. Krempel, A. C. Martin, H. H. Martin, S. B. Marston, B. M. Morris, Octavius Morgan, O. W. Morgan, S. T. Norton, H. M. Patterson, T. F. Power, A. F. Rosenheim, P. J. Van Trees, J. T. Vawter, August Wackerbarth, A. R. Walker, H. F. Withey, W. H. Willson.

As guests of the Chapter were present Charles Gordon, a local architect; Cyril Bennett, architect of Pasadena, California; H. Conger Bowers, consulting electrical engineer, the speaker for the evening; W. E. Prine, of the Southwest Contractor, and John Bowler, of the Builder and Contractor.

The minutes of the seventy-fifth meeting, eighth annual meeting, held on October 13, 1914, and minutes of the seventy-sixth meeting, special meeting, were read and approved.

For the Board of Directors, the acting secretary reported three meetings had been held since the last report; that at the meeting of September 30th the resignation of J. Martyn Haenke was presented and accepted; that at the meeting of October 13th letter ballots were opened and Aleck E. Curlett was reported elected a regular member of the Chapter; that at the meeting of November 10th applications were presented for two new members.

Following the report of the directors the acting secretary read the president's committee appointments for the ensuing year.

For the report of the Committee on Membership, the chairman, Mr. John P. Krempel, announced that the committee had been actively at work on the securing of additional members.

For the A. I. A. Sub-Committee on Public Information, President A. C. Martin reported for Mr. Elmer Grey the receipt of an invitation from Miss M. L. Schmidt to all Chapter members to a reception to be held at the Metropolitan Exhibit on November 23rd.

For the A. I. A. Sub-Committee on Education, Mr. Charles Greene reported the addition of Mr. D. C. Allison to his committee by the president's appointment.

Communications were next read as follows:

From Webster Tomlinson, secretary of the Illinois Chapter of the American Institute of Architects relative to the itinerary decided upon by the Illinois delegation for their trip to the coming convention, and further urging the delegation from the Southern California Chapter to join with them in this trip. This communication was ordered filed.

Communications were next read from J. C. Kemper, acting executive secretary of the American Institute of Architects, and from Bert L. Fenner, secretary pro tem of the American Institute of Architects. These communications covered the question raised by the local Chapter relative to the legal status of the acts performed by the acting secretary, who is a non-institute member. These communications pointed out the possibility of a protest or challenge in matters of either Chapter or Institute importance and advised the local Chapter that the office should be filled by an Institute member. Following a general discussion and after various suggestions, a motion was made, duly seconded and carried, that Mr. John P. Krempel be appointed secretary pro tem to perform such portion of the secretary's duties as might otherwise be subject to legal challenge. The acting secretary was further instructed to communicate the action of the chapter to the Institute's executive secretary.

Under the head of unfinished business the annual report of the treasurer, deferred from the last regular meeting, was presented by the treasurer. Following the reading of this report the president appointed an auditing committee consisting of J. J. Backus, John P. Krempel and John T. Vawter to check the report of the treasurer.

During the time the auditors were engaged in checking this report, under the head of new business, Mr. H. M. Patterson brought up for discussion the matter of a prospective application for membership in the Chapter of a certificated architect now under contract for services with a building company. After general discussion the advisability of such membership was referred to the Chapter's Committee on Membership.

Followed the report of the auditors, who declared the annual report of the treasurer to be in all respects correct. Upon motion made, seconded, and duly carried, the report of the Auditing Committee and the report of the treasurer were adopted, the latter to be spread upon the minutes of the meeting.

The order of business was here set aside to permit Mr. H. Conger Bowers, a representative of the California Association of Electrical Contractors and Dealers, to address the Chapter in the interest of the Electrical Association's work. Mr. Bowers presented a clear, concise and most interesting talk, and in closing requested for his association the appointment of a committee by the Chapter to act with a like committee from their own organization in the work of standardizing lists of electrical materials and appliances, and in establishing unit prices for extras, etc. In accordance with the request the motion was made, duly seconded and carried that the Chapter's Special Committee on Contracts and Specifications be delegated to handle the work, and to report if possible at the next meeting.

Upon motion made by Mr. Octavius Morgan, duly seconded and carried, a vote of thanks was offered to Mr. Bowers for his very able talk.

Following the address of Mr. Bowers, and under the head of new business, a general discussion followed relative to instructions to delegates to the coming convention. It was moved, seconded, and duly carried that the local delegates use their utmost efforts to bring the 1915 convention to Los Angeles.

Mr. J. E. Allison further brought up for general discussion the present status of the State legislative act licensing architects, and offered as a suggestion that proper attorneys be employed and that the Southern California and San Francisco Chapters get behind a movement to strengthen the arm of the State Board of Architecture by amending certain objectionable features in the existing law.

Upon the departure of the president, Mr. A. C. Martin, Mr. S. Tilden Norton, vice-president, took the chair.

Following, Mr. H. Conger Bowers added a few additional remarks, outlining the Electrical Association's plan for the inspection of work on buildings.

After various other discussions the meeting adjourned at 9:55 p. m.

FERNAND PARMENTIER,
Secretary.

By A. R. WALKER,
Acting Secretary.

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OREGON CHAPTER, A. I. A.

Held at the University Club on October 22, 1914.

After a dinner the meeting was called to order by President Whitehouse. The President appointed Wm. G. Holford, secretary pro tem, in the absence of Secretary Lawrence.

Following members responded to the roll call: Morris H. Whitehouse, president; A. E. Doyle, vice-president; Folger Johnson, treasurer; E. M. Lazarus, trustee; Fouilhoux, Tegen, Knighton, Hoffman, E. Schacht, Naramore, Holford, Webber, Wilson, Beckwith.

Moved by Doyle, seconded by Hoffman, and carried that the minutes of last meeting be approved as printed.

COMMITTEE REPORTS.

COMMITTEE ON PROFESSIONAL PRACTICE.

No report.

COMMITTEE ON BUILDING LAWS.

Mr. Fouilihoux, chairman, submitted a written report covering the year's work; noting commissioner's delay in adopting housing, school buildings and wiring codes. Reported that new plumbing code and revision of entire building code are nearing completion.

Moved by Mr. Doyle, seconded by Beckwith, and carried that the report be accepted.

COMMITTEE ON LEGISLATION.

Mr. Lazarus, chairman, submitted a written report outlining modification of existing lien law and recommending action on license law and office of state architects.

Report ordered filed as read.

COMMITTEE ON MUNICIPAL PLANS AND AFFAIRS.

Mr. Johnson, chairman, submitted a report covering endeavors, to secure architectural supervision on interstate bridge, bridges on Columbia Highway and attempt to secure prohibition of advertising signs along the right of way of the Columbia Highway.

Report ordered filed as read.

COMMITTEE ON EDUCATION AND ARCHITECTURAL LEAGUE.

Mr. Holford, chairman, submitted a report covering work of local Atelier and resume of work of the league convention in Seattle.

Report ordered filed as read.

COMMITTEE ON COMPETITIONS.

Mr. Hogue, chairman, sent in a report summarizing communications from San Francisco Chapter regarding Portland postoffice competition and from Emil Schacht and Son regarding the Pallet matter.

Report ordered filed as read:

COMMITTEE ON ENTERTAINMENT.

Mr. Fouilihoux, chairman, submitted a report covering year's work and regretting that many members failed in the courtesy of using return card announcements.

Report ordered filed as read.

COMMITTEE ON QUANTITY SURVEY.

Mr. Hogue, chairman, sent in a report covering "plan of operation," adopted by joint committee on the item of standardization of building materials. Mr. Hogue desired an express of opinion from the Chapter on the "plan of operation" as submitted.

Moved by Mr. Doyle and seconded by Naramore and carried that the Executive Committee discuss and act upon the "plan of operation" as submitted by Mr. Hogue.

COMMITTEE ON PUBLIC INFORMATION.

Mr. Lawrence, chairman, sent in a written report covering the year's work, stating that the newspapers were ready to print all items of impersonal and news character. Mr. Lawrence expressed the opinion that the work of a Committee on Public Information is indispensable to professional advancement.

Report ordered filed as read.

COMMITTEE ON OREGON INDUSTRIAL LEAGUE.

Mr. Smith, chairman, sent in a report enclosing statement of purpose of the league and method to be adopted to carry out its aims.

Report ordered filed as read.

The treasurer's report was then read.

President appointed Beckwith and Naramore to audit the report and report back.

The president next read his annual address covering the year's work of the Chapter, and recommending matters for consideration of the Legislative Committee and the Building Code Committee and further recommending that the Chapter have printed forms made containing the scale of charges adopted by the Chapter during the past year and the Code of Ethics of the A. I. A.

Moved by Tegen, seconded by Beckwith, that the address be accepted.

Moved by Lazarus, seconded by Doyle and carried that a copy of the president's address be sent to Mr. Whitaker.

The president asked for the names of those who expected to attend the annual convention of the institute for the purpose of appointing delegates. None present were going.

Letter was read from the Associated Charities asking members of the Chapter for financial assistance. Mr. Johnson moved Mr. Naramore, seconded and carried, that the treasurer send the Associated Charities a check for $10 from the Chapter.

The president then brought up for discussion the future of the Atelier.

Mr. Holford reported on the possibility of the University of Oregon handling the Atelier as a part of its extension work.

Moved by Johnson and seconded by Naramore and carried, that discussion of the Atelier matter and all other business be taken up at a special meeting called for that purpose in the near future, and that the meeting proceed to the election of officers.

The president appointed as tellers Naramore and Beckwith, and later Mr. Wilson in Naramore's place as Naramore was candidate for treasurer.

The president then withdrew his name as candidate for president.

Moved by Fouilihoux and seconded by Wilson and carried, that the secretary cast the unanimous ballot of the meeting for Mr. Doyle as president.

Tellers reported Mr. Johnson elected vice-president.

The president then read a letter from Mr. Lawrence withdrawing his name as a candidate for all of the offices for which he had been nominated as he would be out of town on the regular meeting days.

Moved by Tegen, seconded by Beckwith and carried, that the secretary cast the unanimous ballot of the meeting for Mr. Holford as secretary.

Tellers announced Fouilihoux elected treasurer.

Moved, seconded and carried that the secretary cast unanimous ballot of meeting for Jaccoberger and Naramore as trustees.

Results of election are as follows:

A. E. Doyle, president; Folger Johnson, vice-president; W. G. Holford, secretary; J. A. Fouilihoux, treasurer; J. Jaccoberger, trustee; F. A. Naramore, trustee.

Moved, seconded and carried, that the meeting adjourn.

WM. G. HOLFORD,
Secretary pro tem Oregon Chapter, A. I. A.

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WASHINGTON STATE CHAPTER, A. I. A.

The annual meeting of the Washington State Chapter, American Institute of Architects, was held on Wednesday evening, November 4th, at the University Club, preceded by dinner, at which eighteen members were present.

The annual reports of the secretary and treasurer, and the following standing committees were read:

Architectural League of the Pacific Coast, by W. M. Somervell.

Competitions, by James Stephen.

Education, by David J. Myers.

Exhibition, by Carl F. Gould.

Ordinances, by A. H. Albertson.

Institute Affairs, by Chas. H. Alden.

Professional Practice, by Joseph Cote.

The annual address of the president was read by Mr. Stephen, and was entitled, "The Human Side of the Architect." It dealt with some of the foibles of the profession in a humorous manner.

Mr. Marshall A. Dean of Ellensburg was elected a member of the Chapter.

It was decided to hold a special meeting to consider such matters as would come up at the convention of the Institute at Washington in December, to which the following delegates were elected: Chas. H. Bebb, Joseph Cote, Arthur L. Loveless, and James H. Schack.

The secretary was instructed to secure the traveling exhibition of the Beaux Arts Society, sent out under the auspices of the American Federation of Arts, for the benefit of the draftsman studying the Beaux Arts problems.

The following officers for the ensuing year were elected:

President, James H. Schack, Seattle; vice-presidents, Joseph Cote, Seattle; George Gove, Tacoma; L. L. Rand, Spokane; secretary, Arthur L. Loveless, Seattle; treasurer, Andrew Willatzen, Seattle; member of council, James Stephen, Seattle.

ARTHUR L. LOVELESS,
Secretary.

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